

BULLETIN 1168B

PARTS

MODEL 28
REPERFORATOR TRANSMITTER SET (RT)



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LIST OF EFFECTIVE PAGES

AUGUST, 1964

(Supersedes June, 1963 Issue)

	
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SECTION 5 - NOTES OF EXPLANATION CONVERSION AND MODIFICATION KITS

SECTION 6 - NUMERICAL INDEX

UNITS COVERED

MODEL OF REPRESENTANT TRANSCRIPTER BASSE										
MODEL 28 REPERFORATOR TRANSMITTER BASES										
Operating Speed										
	Receiving (In	out)	Tn	ansmitting (Out	put)					
Teletype Code	W.P.M.	Baud	W.P.M.	Baud	Unit Code					
LRXB1	60-75-100		100*		7.42					
LRXB2	100*		100*		7.42					
LRXB3	100*		60-75-100		7.42					
LRXB4	60-75-100		60-75-100		7.42					
LRXB5	75		75		7.42					
LRXB6	45.5-50-74.2 45.5-50-74.1									
LRXB7	60		60		7.42					
LRXB8	See Figure 2-4. For Interchangeable Gear Sets									
LRXB9			60-75-100		7.42					
LRXB10	60		60		7.42					
LRXB11	60-67-75		60-67-75		7.42					
LRXB12	60-75-100		60-75-100		7.42					
LRXB13		50		. 50	7.50					
LRXB14	60-75-100		60-75-100		7.42					
LRXB15		50		50-75	7.42 - 7.50					
LRXB16		50		50-75	· 7.50					
LRXB17		45.5 - 75		75	7.00					
LRXB20			100	74.2	7.42					
LRXB21	See Figure	2-4. For Inter	changeable (Gear Sets						
LRXB22	60-75-100		60-75-100		7.42					
LRXB23			60-75-100		7.42					
LRXB24	60-75-100		60-75-100		7.42					
LRXB25	See Figure	2-4. For Inter	changeable (Gear Sets						
LRXB26			100	74.2	7.42					
LRXB27		45.5-50-75		45.5-50-75	7.00					
LRXB31 LRXB32	See Figure	See Figure 2–4. For Interchangeable Gear Sets								

MODEL 28 TAPE HANDLING STANDS								
Teletype Supply Ree		Max.Winding Speed (WPM)	Fully Perforated Winding Capacity (FT)	Chadless Winding Capacity (FT)				
LTHS200**	3000	200		1000				
LTHS201**	3000	200		1000				
LTHS202**	3000	1000	3000					
LTHS204**	3000	200		1000				
LTHS205**	3000	200	3000					
LTHS207**	3000	1000	3000					
LTHS209**	3000	1000	3000					
LTHS210**	3000	200		1000				
LTHS211**	3000	200	3000					
LTHS212**	3000	2000	3000					
LTHS213**	3000	2000	3000					

MODEL 28 MOTOR UNITS						
Teletype Code	Motor Type					
LMU3 LMU11 LMU12 LMU13 LMU23 LMU30	Synchronous (115V) Synchronous (115V) Synchronous (115V) Governed (115V) Governed (48V) Synchronous (115V)					

MODEL 28 UNIVERSAL CABINETS						
Teletype Code						
LBAC201** LBAC228**						
LBAC204**	LBAC236**					
LBAC212**	LBAC237**					
LBAC220**	LBAC238**					
LBAC221**	LBAC239**					

PAINT FINISH COLOR CODE CHART								
(For Parts and Assemblies Replacing a Paint Finish)								
		Finish Suffixes						
Color	Wrinkle	Smooth	Textured	Smooth				
	Finish	Finish	Vinyl	Vinyl				
Black	AA (37)	ВВ						
Dark Brown Gray Green	AD (38)	DI/	GA (45)					
	AB (40)	BK	OA (43)					
Charcoal Gray	AL	ΒZ	GB	HA				
Dark Gray Light Gray		EJ		нв				
Beige Gray								
Light Beige		EL	GC	HC				
Moss Green		EN		HD				
Eye Rest Green		EA						
Turquois		EV						
Aqua Blue		EK						
Brussels Light Blue		EC						
Medium Blue		ES						
Cherry Red		EF						
Pastel Yellow		EG						
White		EH						
Ivory		EM						
Beige		ET						
Rose Beige Rose Pink		ER EU						
Nose Fink		20						
Dark Covert Gray		5 14		HE				
Light Olive Gray Fawn		EW		HF (46) HG				
ruwn				110				

Numbers in Parenthesis () indicates Bell System Code.
Suffix to be applied following the part number.
Other colors available on request.

TELETYPE AND BELL SYSTEM CODE REFERENCE CHARTS

MODEL 28 REPERFORATOR TRANSMITTER SET COMPONENTS										
Description Bell System Code										
Reperforator Transmitter Unit	28A `		28B		28C		28D	<u> </u>	28E	
Reperforator Transmitter Stand	28A**	28A**	28A**	28B**	28A**	28C**	28A**	28D**	28A**	28E**

			MODEL 28	KEPEKI	FORATO	KIKAI	42WILLEK	UNIT	COMPONE	N12				
Description							(Telety)	pe to B	ell System (Codes)				
Transmitter Distributor (Pivoted)	LAXD2		LAXD2		LAXDI		LAXD1 `		LAXDI		LAXD1		LAXDI	
Reperforator (Typing)	LPR3***						LPR25***		LPR25***		LPR25***			
Reperforator (Non=Typing)		28A	LRPE2	≥ 288	LRPE2	≥ 28C		> 28D		► 28E		▶ 28F	LRPEll	280
●Reperforator Transmitter Base	LRXBI		LRXB2		LRXB3		LRXB12		LRXB12		LRXB14		LRXB22	
• Motor Unit	LMU11		LMU11		LMU11		LMUII		LMU13		LMU12		LMU11	

^{***}Indicates typewheel variation

END PANELS							
Bell System Code	Teletype Part No.						
28A**	164091 (R) (Includes Hardware)						
28B**	164092 (L) (Includes Hardware)						

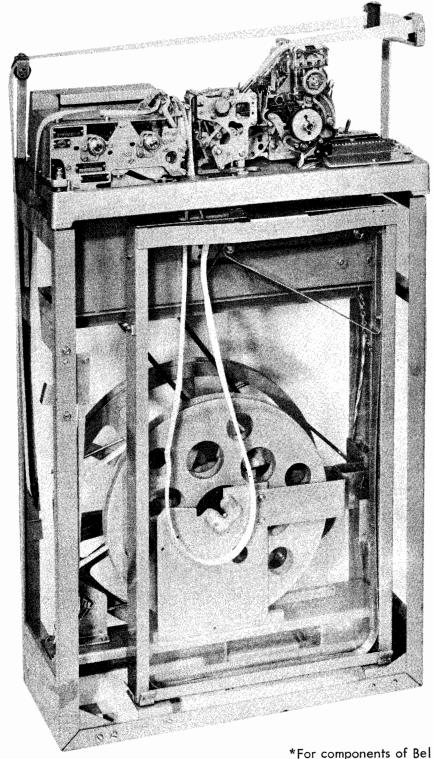
MODEL 28 REPERFORA	TOR TRANSMIT	ter stand
Description	Teletype Code	Bell System Code
• Tape Handling Stand	LTHS200** LTHS210**	28A** ·

MODEL 28 CABINETS		
Description	Teletype Code	Bell System Code
• RT	LBAC212** LBAC220**	28A** 28B**
• Turning	LBAC221**	23A**

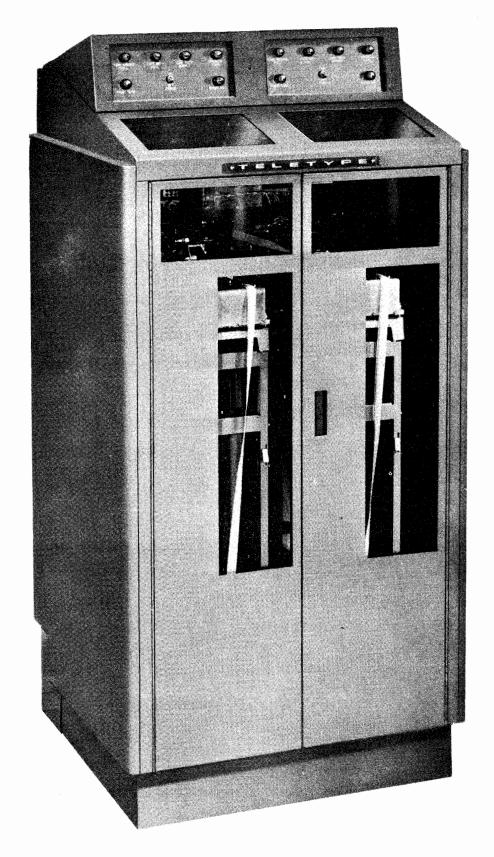
Components of Model 28 Reperforator Transmitter Sets Covered in this bulletin.
 For other components, see Parts Bulletin 1170B (LAXD), 1167B (LPR) and
 1172B (LRPE). For the Tape Splicer, see Parts Bulletins 1173B.

BELL SYSTEM ONLY

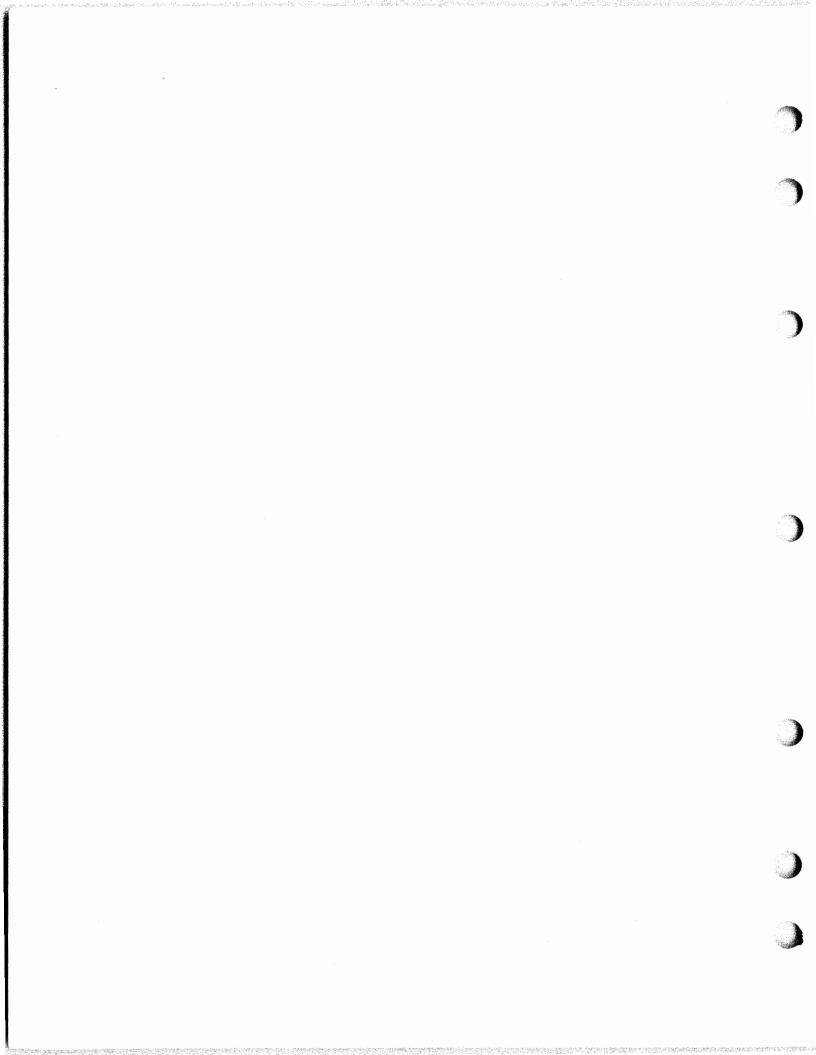
When ordering parts from this bulletin, prefix each number with the letters TP.



*For components of Bell System 28B** Reperforator Transmitter Set illusstrated, see page E.



MODEL 28 UNIVERSAL TYPE APPARATUS CABINET (LBAC)



SECTION 1

TAPE HANDLING STAND

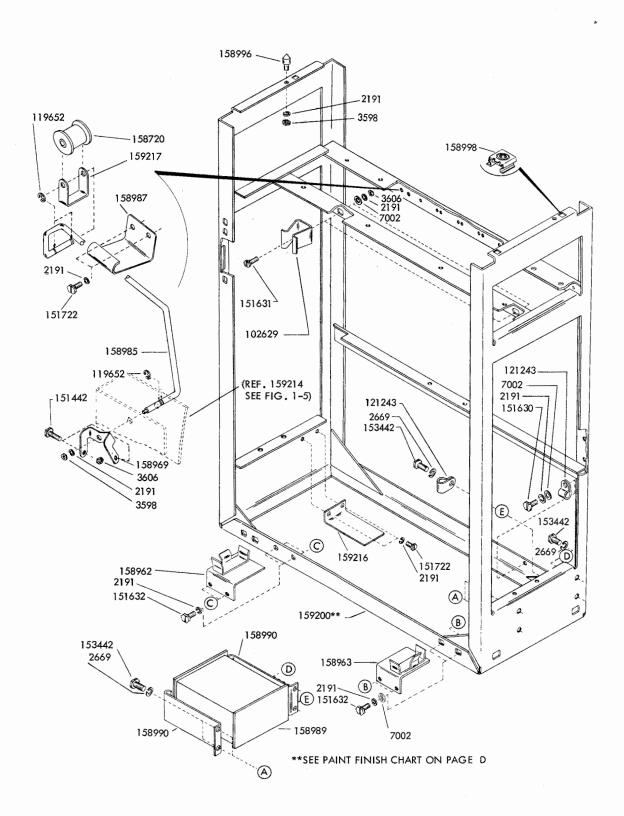


FIGURE 1-1. FRAME (VIEW 1)

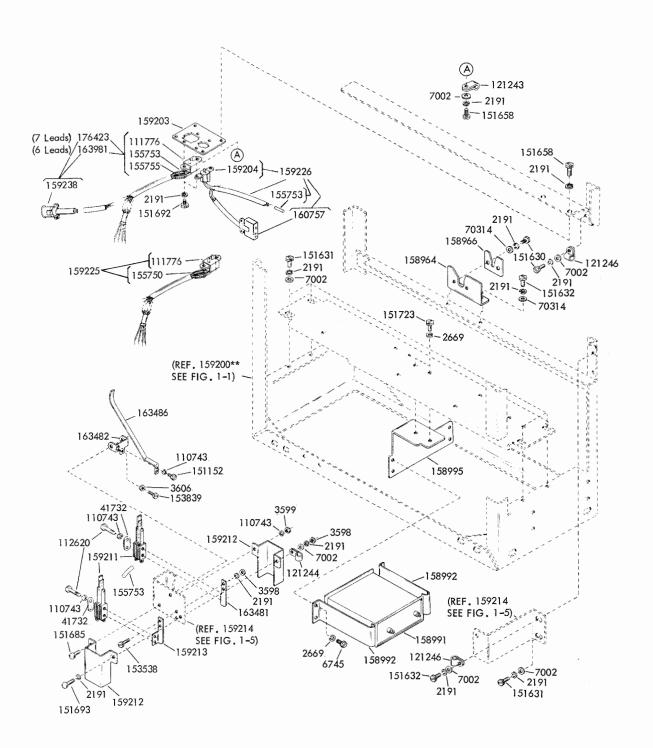


FIGURE 1-2. FRAME (VIEW 2)

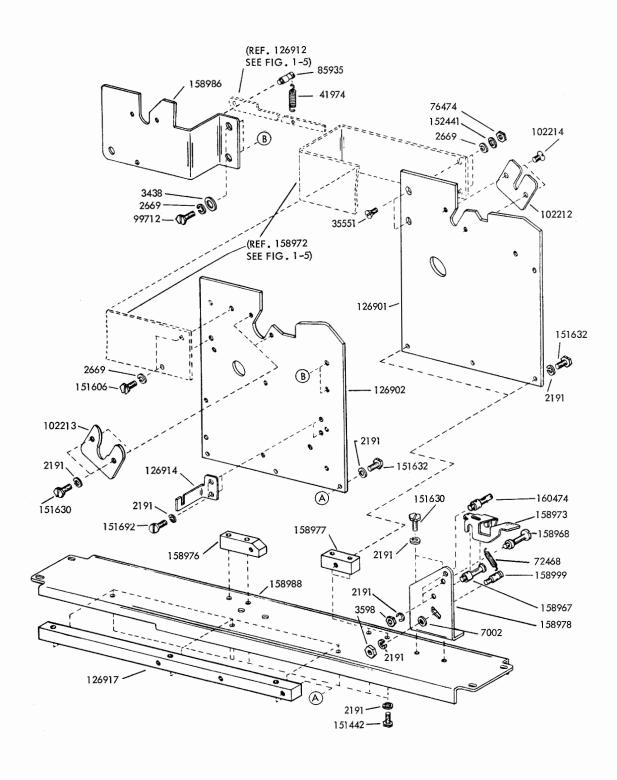
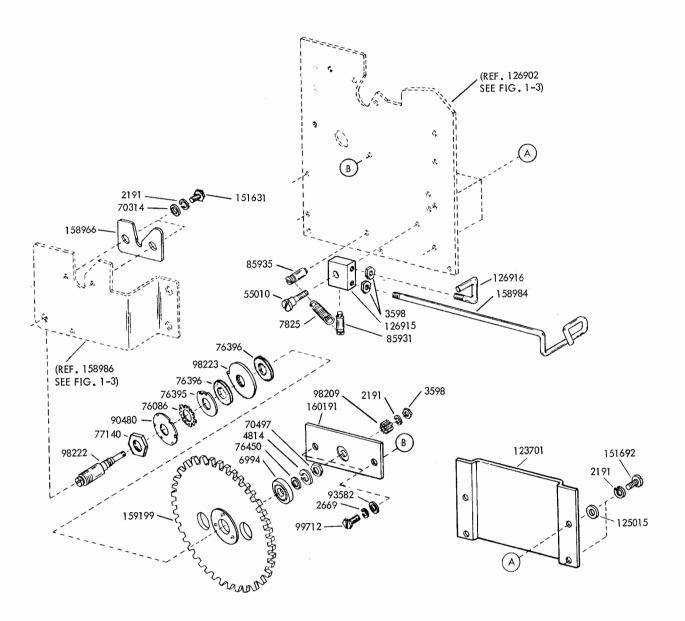


FIGURE 1-3. TAPE WINDER (VIEW 1)



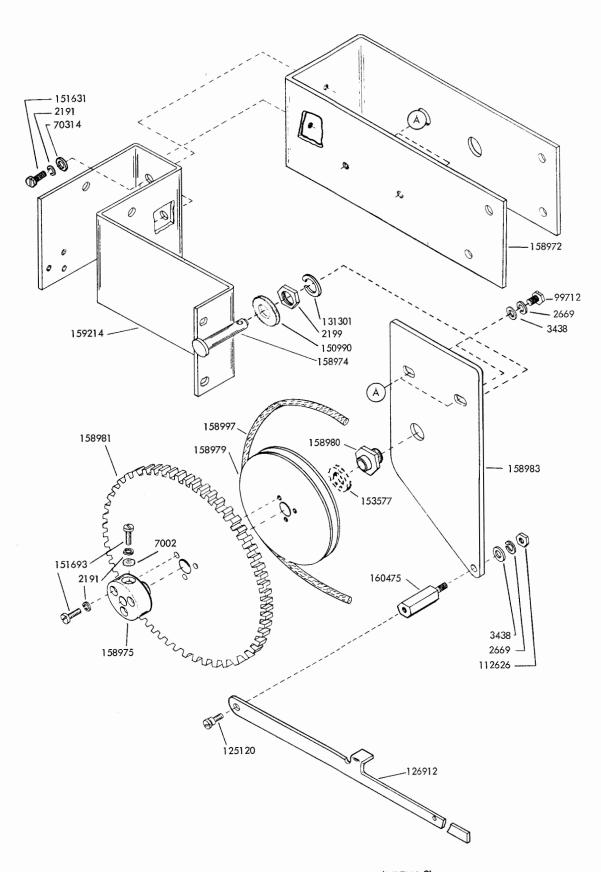


FIGURE 1-5. TAPE WINDER (VIEW 3)

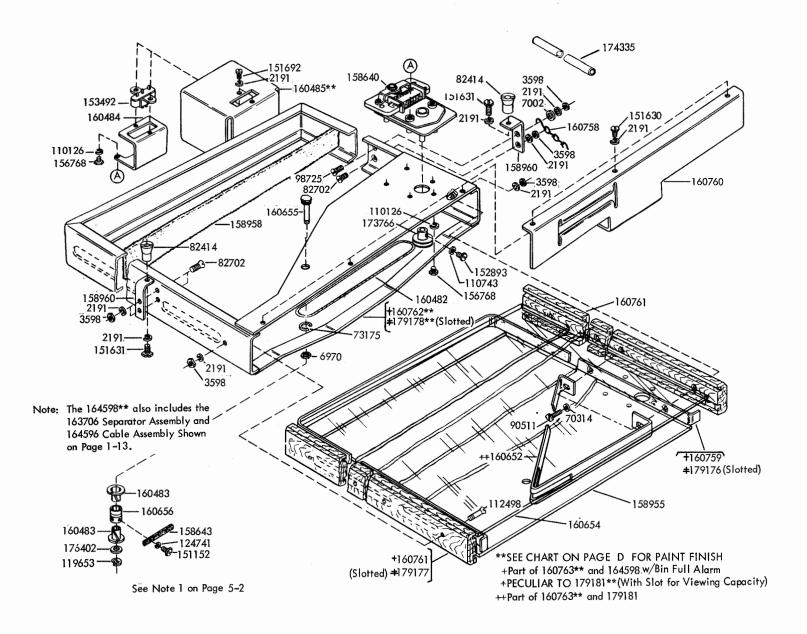
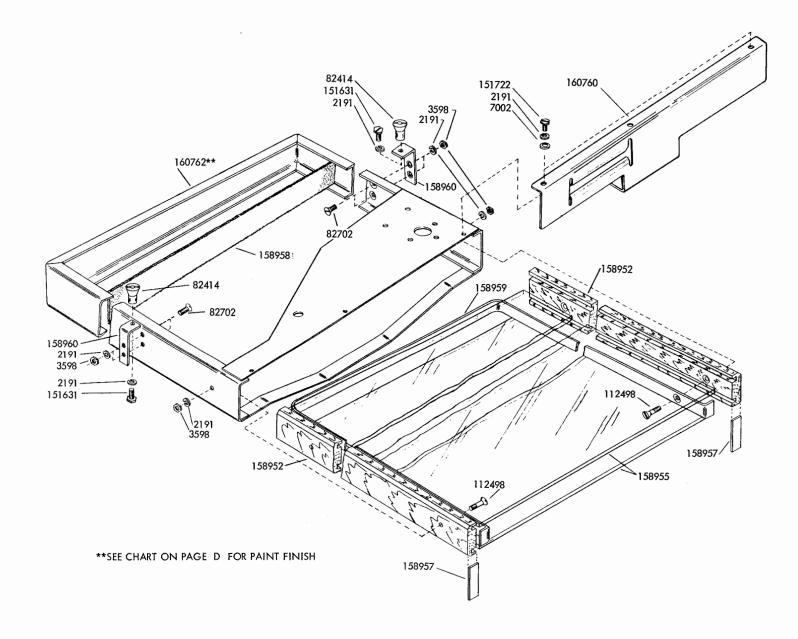
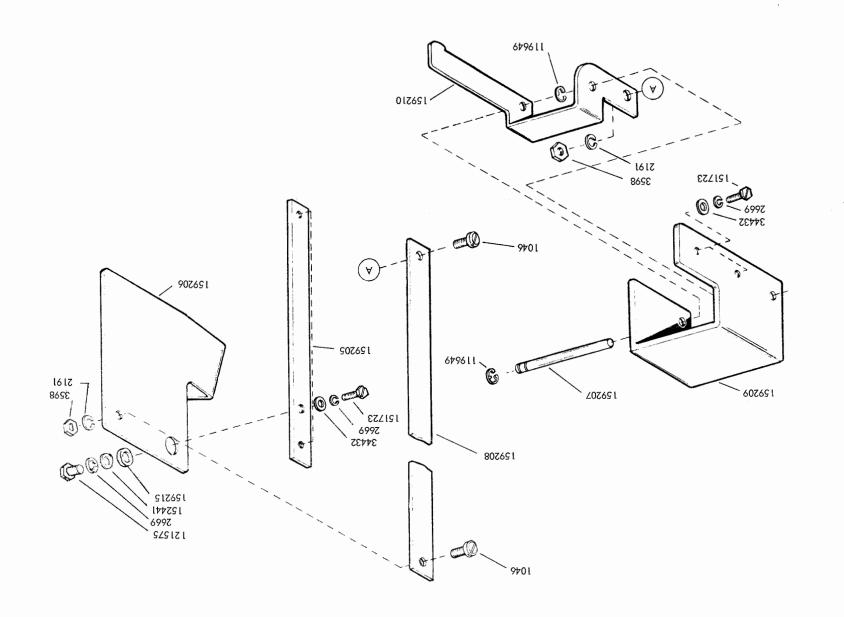


FIGURE 1-7.

159202** TAPE STORAGE BIN ASSEMBLY (WITHOUT MOTOR)





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FIGURE 1-8. 159218 LATCH ASSEMBLY

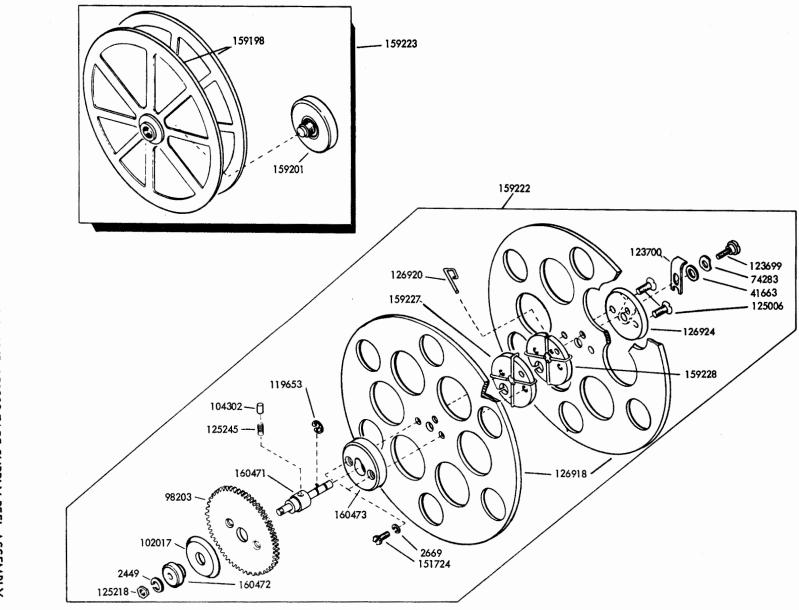
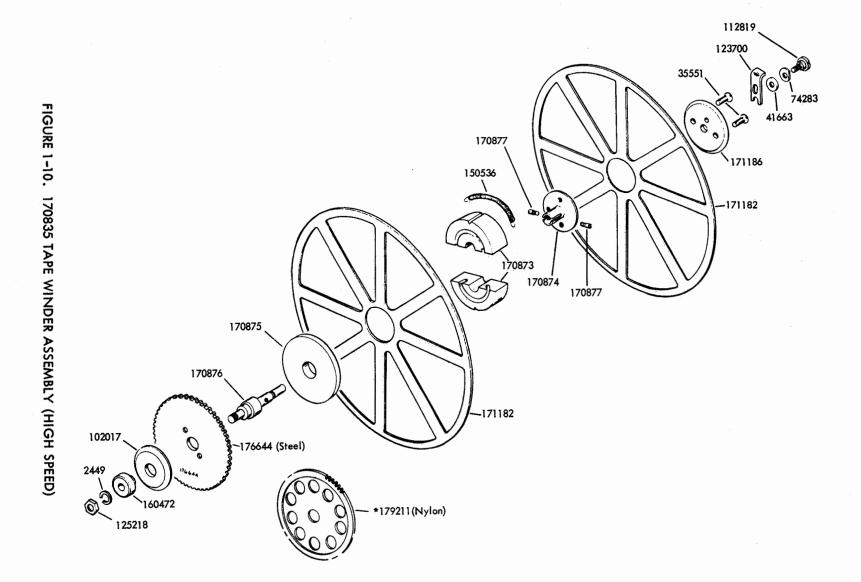


FIGURE 1-9. 159222 TAPE WINDER REEL ASSEMBLY AND 159223 TAPE SUPPLY REEL ASSEMBLY (LOW SPEED)



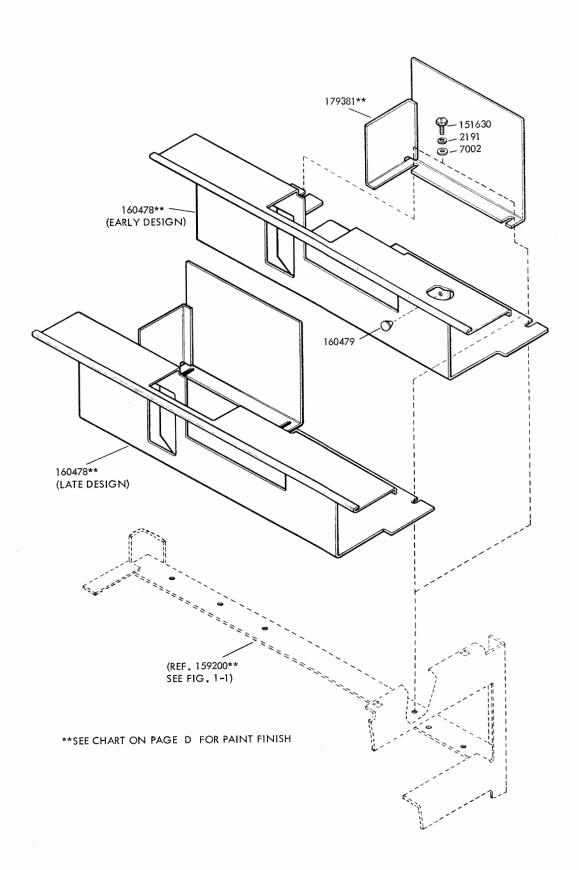
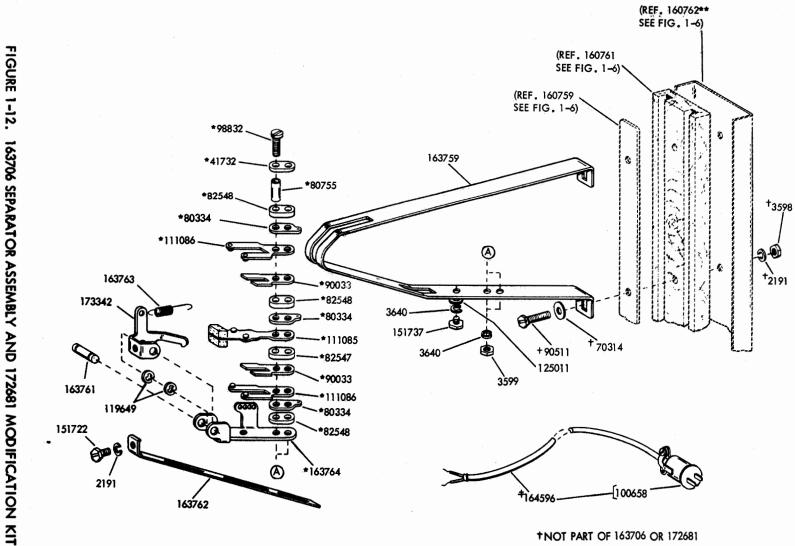
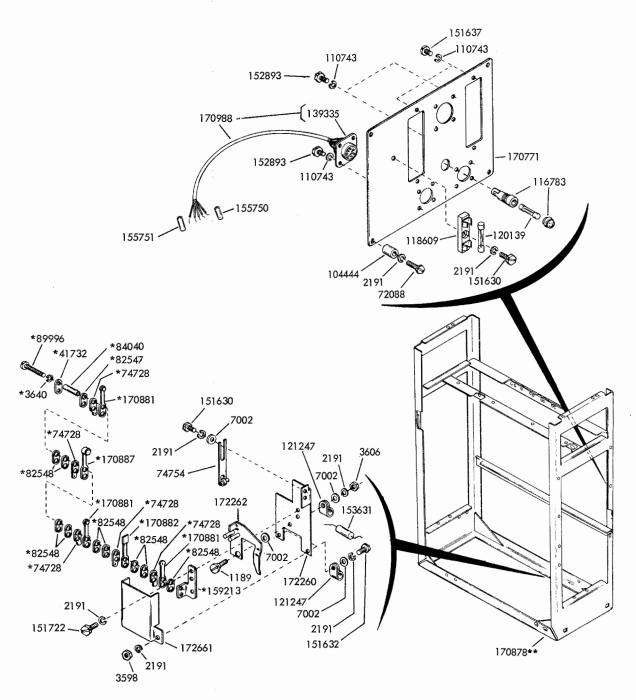


FIGURE 1-11. COVER (OIL SHIELD)



†PECULIAR TO 172681

*PART OF 163750 CONTACT ASSEMBLY
**SEE CHART ON PAGE D FOR PAINT FINISH



*PART OF 170880 (Tight Tape & Low tape)

** SEE CHART ON PAGE D FOR PAINT FINISH

FIGURE 1-13. FRAME (VIEW 3)

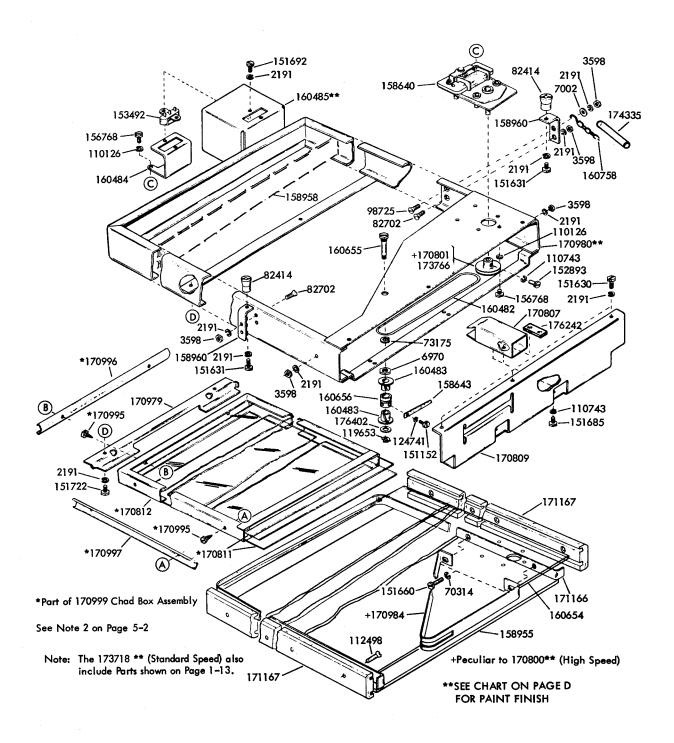
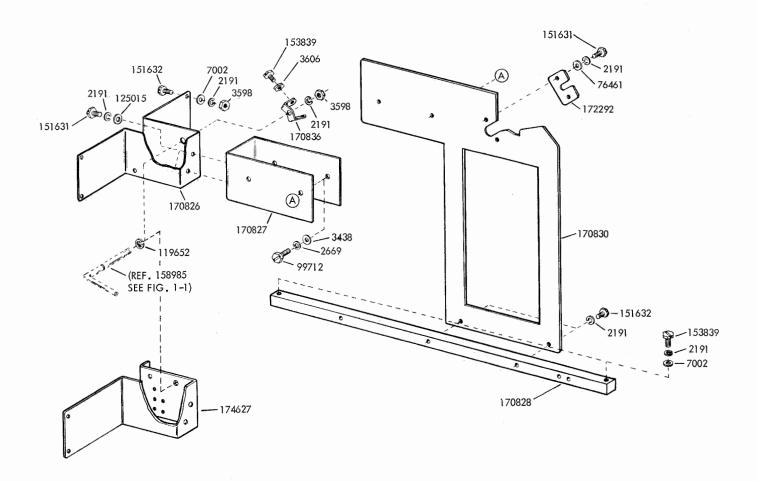


FIGURE 1-14. 170800** AND 173718** TAPE STORAGE BIN ASSEMBLIES

CHANGE 5



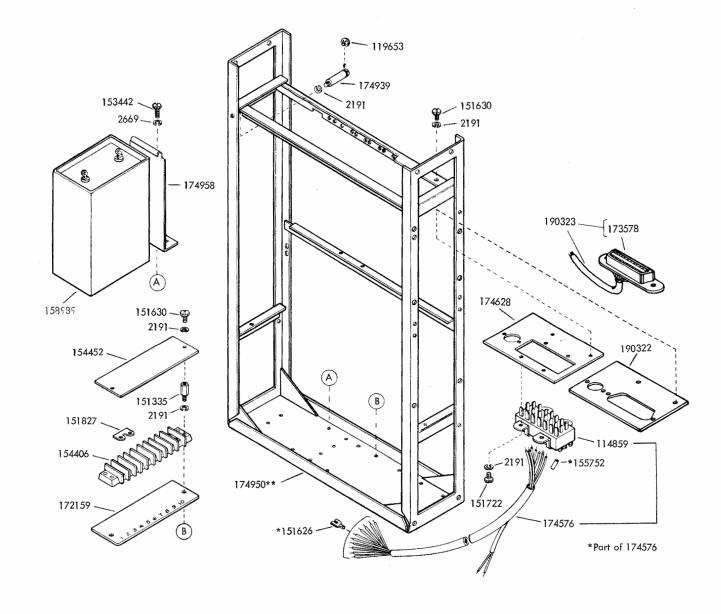
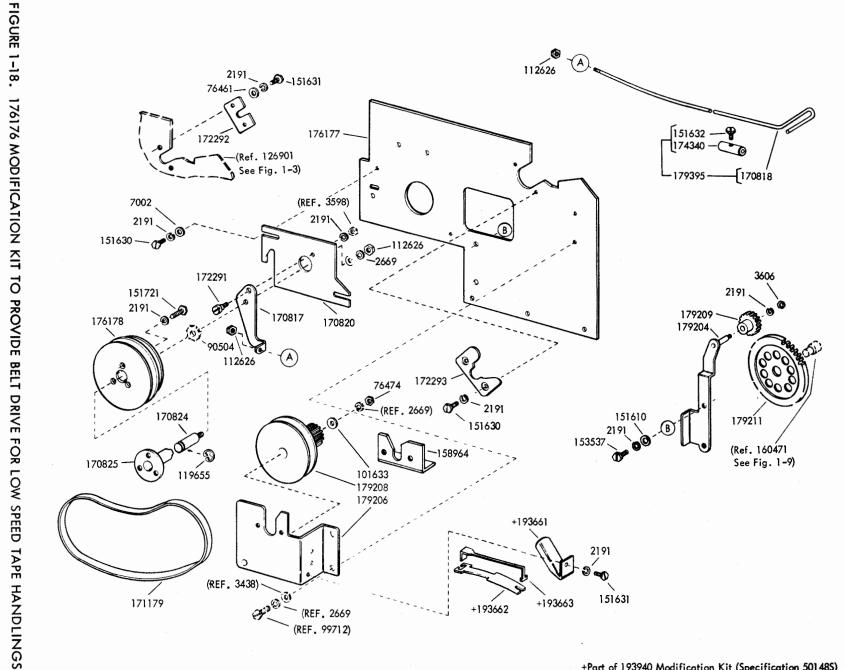
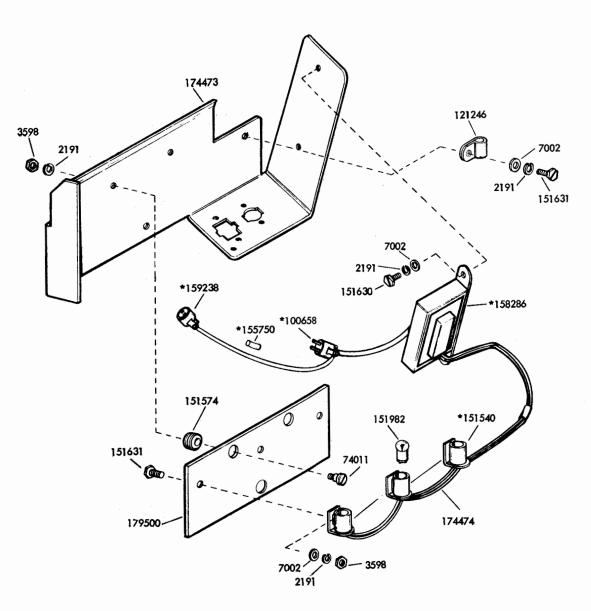


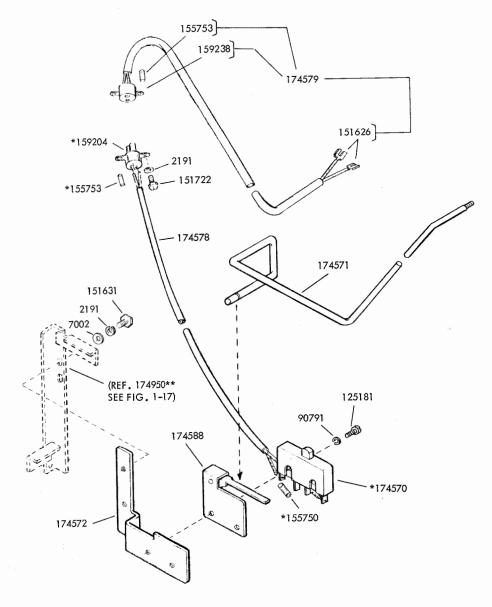
FIGURE 1-17. FRAME AND ELECTRICAL COMPONENT





*Part of 174474

FIGURE 1-19. 174472 MODIFICATION KIT TO PROVIDE AC LIGHTING FOR LTHS STAND



*Part of 174578

FIGURE 1-20. 174569 MODIFICATION KIT TO PROVIDE END-OF-TAPE CONTACTS ON TAPE HANDLING STANDS

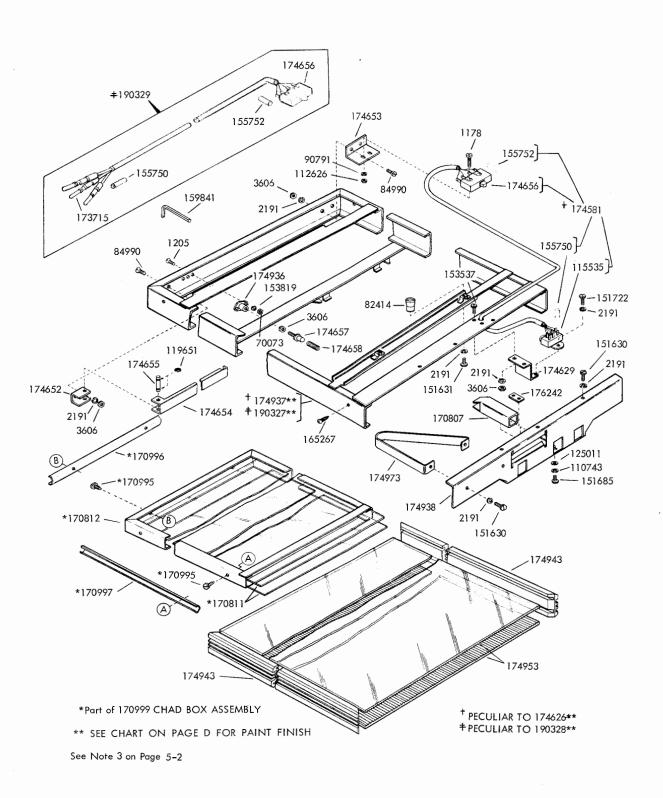


FIGURE 1-21. 174626** AND 190328 TAPE STORAGE BIN ASSEMBLIES (WITHOUT MOTOR)

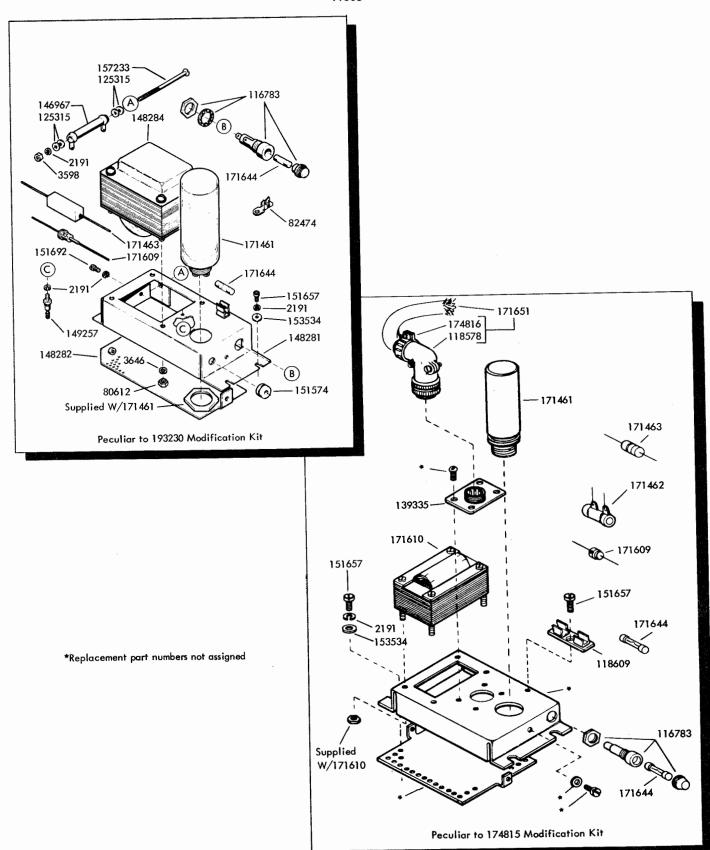
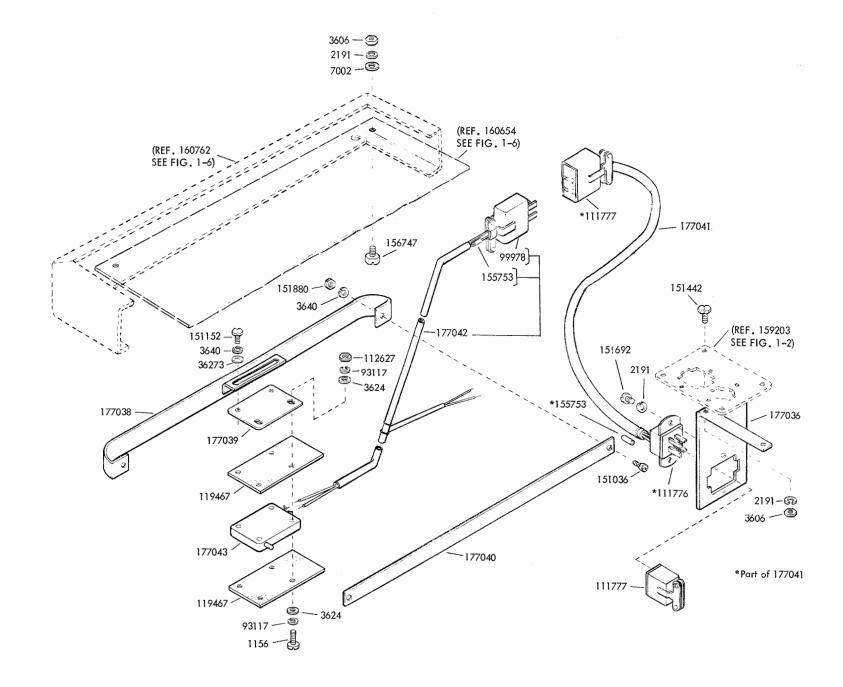
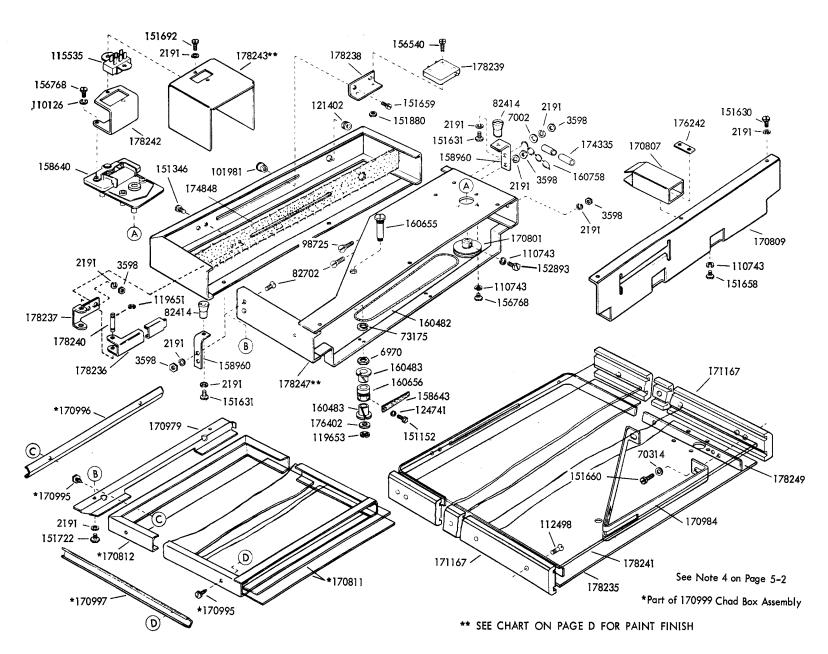


FIGURE 1-22. 174815 AND 193230 MODIFICATION KITS TO PROVIDE 48V POWER SUPPLY

FIGURE 1-23.

177035 MODIFICATION KIT TO PROVIDE TAPE BIN LOW ALARM





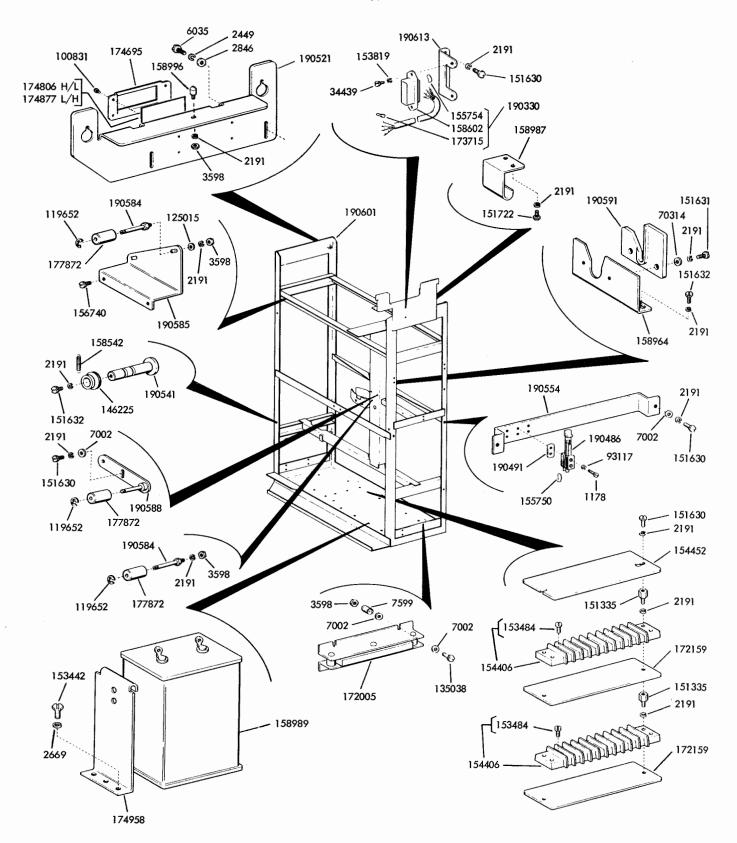


FIGURE 1-25. FRAME MECHANISM

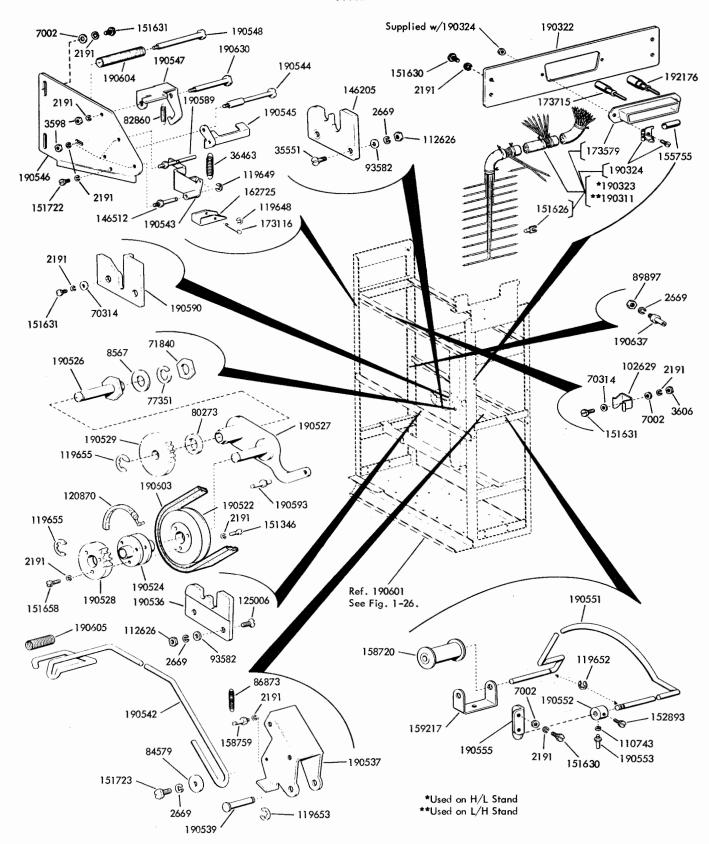


FIGURE 1-26. FRAME MECHANISM

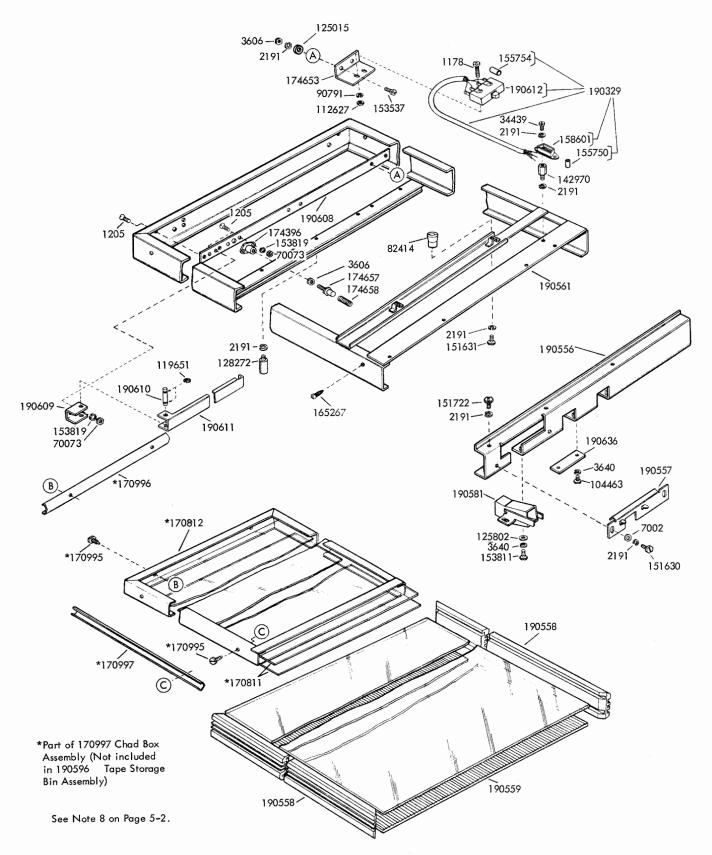
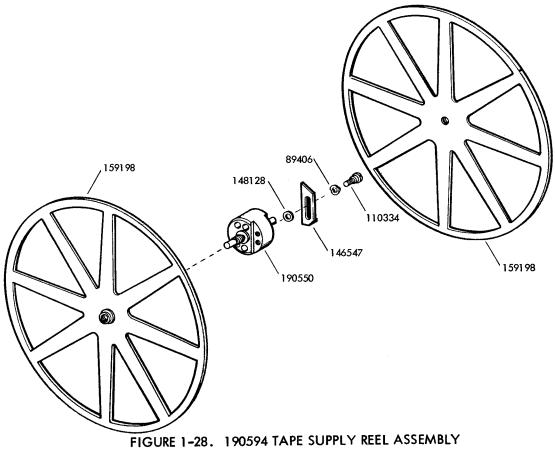


FIGURE 1-27. 190596 TAPE STORAGE BIN ASSEMBLY



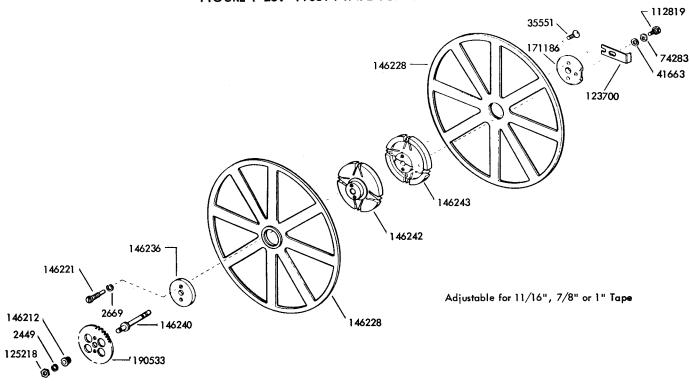


FIGURE 1-29. 190595 TAPE WINDER REEL ASSEMBLY

NUMERICAL INDEX - SECTION 1

Part Number	Description and Page Number	Part Number	Description and Page Number	Part Number	Description and Page Number
1046	Screw, Shoulder (6-40) 1-9	76086	Washer, Spring 1-5	110743	Washer, Lock 1-3,1-7,1-14,1-15,
1156	Screw (2-56 × 9/16 Fil) 1-24	76395	Disk , Friction 1-5		1-22,1-25,1-27
1178	Screw $(2-56 \times 7/16 \text{ Fil})$ 1-22,1-26,	76396	Washer, Felt 1–5	111085	Spring, Contact 1–13
(170	1-28	76450	Shim (.028") 1-5	111086	Spring, Contact 1-13
1189	Screw, Shoulder (6-40) 1-14	76461	Washer, Flat 1–17	111776	Connector, Plug (4 Pt) 1-3,1-24
1205	Screw (3-48 x 19/64 Flat) 1-22,1-28	76474	Nut (10-32 Hex) 1-4,1-16	111 <i>777</i> 112498	Connector, Receptacle (4 Pt) 1-24 Screw (6-40 × 3/4 Flat) 1-7,1-8,
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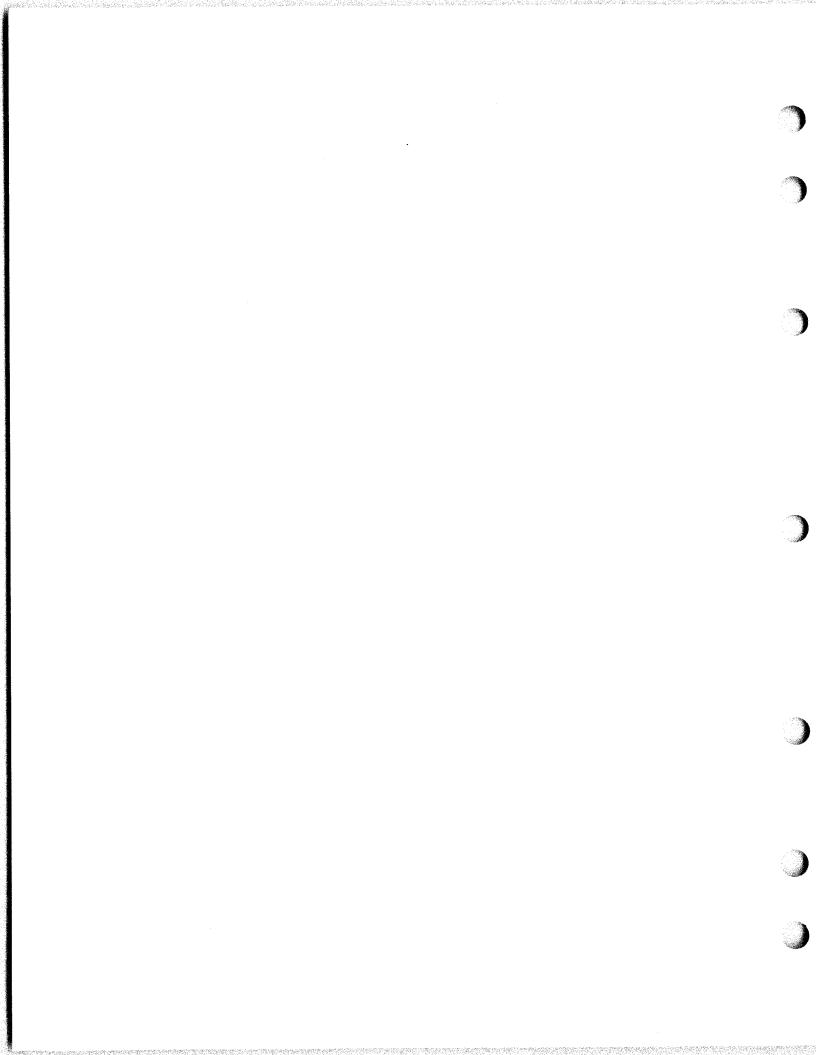
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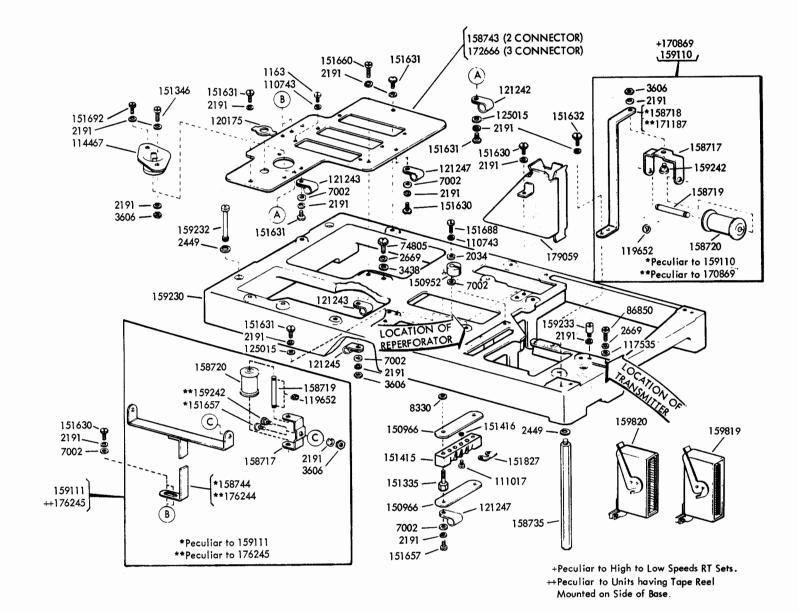
Part	Description and	Part	Description and	Part	Description and
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Part Number 177041 177042 177043 177872 178234** 178235 178236 178237 178238 178239 178240 178241 178242 178243** 178247** 179176 179177 179178** 179204 179206 179208 179209 179211 179381**	Liner 1-25 Liner 1-7 Channel, Mounting 1-7 Frame, Tape Storage 1-7 Bin Assembly, Tape Storage 1-7 Bracket 1-19 Bracket 1-19 Pulley 1-19 Gear (19T) 1-19 Gear (80T) 1-11,1-19 Guard, Gear 1-12	Number 190324 190327** 190328** 190329 190330 190486 190491 190521 190522 190524 190526 190527 190528 190527 190535 190537 190539 190541 190542 190543 190544 190544 190545 190546	Page Number Latch Assembly, Spring 1-27 Bin, Tape Storage 1-22 Bin Assembly, Tape Storage 1-22 Cable Assembly 1-28 Cable Assembly 1-26 Switch 1-26 Switch 1-26 Spacer 1-26 Bracket, Front Mounting 1-26 Pulley, "V" Belt 1-27 Hub 1-27 Post 1-27 Lever 1-27 Gear (34T) 1-27 Gear (41T) 1-27 Shaft w/Bearing and Gear 2-23 Bearing, Right 1-27 Bail 1-27 Post, Tape Guide 1-26 Arm, Tape 1-27 Lever 1-27 Post 1-27 Guide, Tape 1-27 Bracket 1-27 Bail, Latch 1-27 Post, Latch Bail 1-27 Core 1-29	Number 190559 190561 190581 190584 190588 190589 190590 190591 190593 190596 190601 190603 190608 190609 190610 190611 190612 190630 190630 190637 192176	Page Number Window, Plexiglass 1-28 Frame, Tape Storage 1-28 Chute, Chad 1-28 Post 1-26 Bracket, Roller Mounting 1-26 Bracket 1-26 Post, Spring 1-27 Plate, Left Bearing 1-27 Plate, Left Bearing 1-26 Post, Spring 1-27 Bin Assembly 1-28 Frame, Tape Handling 1-26 Belt "V" 1-27 Roller, Spring 1-27 Roller, Spring 1-27 Bracket, Mounting 1-28 Bracket, Bail Mounting 1-28 Bracket, Bail Mounting 1-28 Switch 1-28 Bail 1-28 Switch 1-28 Bracket, Connector Mounting 1-26 Post 1-27 Terminal, Plug Type 1-27 Modification Kit to Provide 48V, Power Supply 1-23
	, ,		•		Modification Kit to Provide 48V,
	, -			100//1	
179395	Rod Assembly 1-19	190551	Arm, Brake 1-27	193661	Reservoir I-19
179500	Plate 1 - 20	190552	Collar 1-27	193662	Holder, Wick 1-19
179746	Modification Kit to Provide Molded	190553	Post, Contact Operating 1-27	193663	Wick 1-19
190311	Pulley And Gear For High Speed Tape Handling Stands 1–11,1–19 Cable Assembly 1–27	190554 190555 190556	Bracket 1–27 Bracket 1–28 County 1 – 28	193940	Modification Kit to Provide a Large Capacity Oil Reservoir 1–19
190322	Plate 1-18	190557	Guide, Tape 1-28		
190323	Cable Assembly 1-18,1-27	190558	Channel, Window 1–28		



SECTION 2

REPERFORATOR TRANSMITTER BASE

FIGURE 2-1. BASE



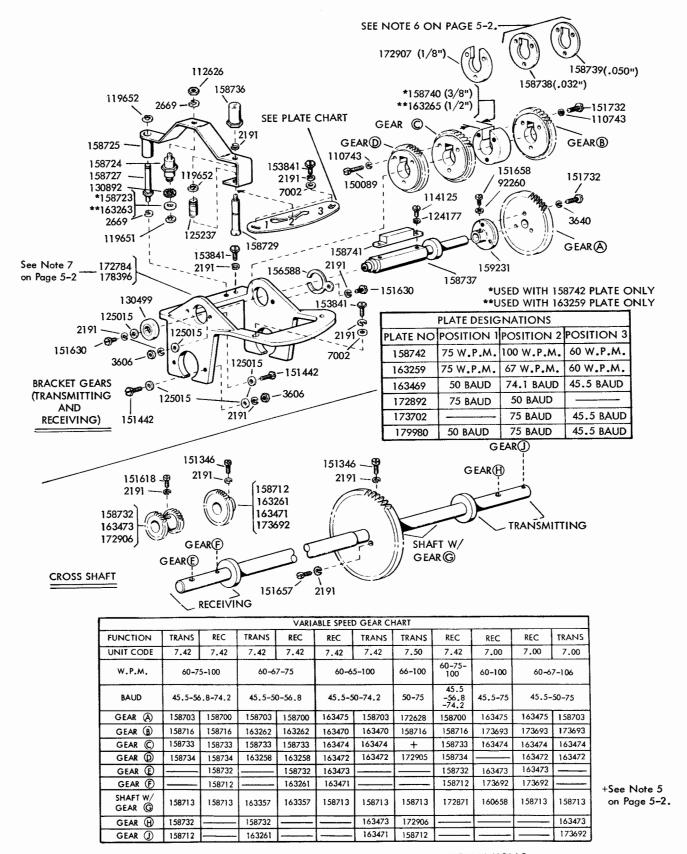
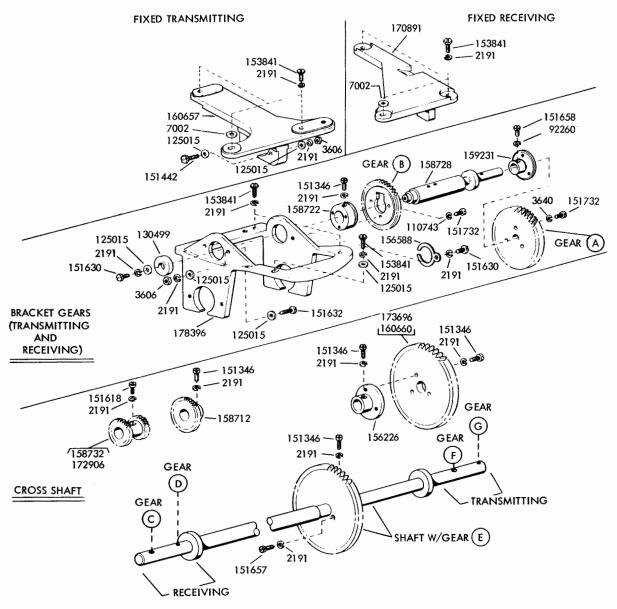
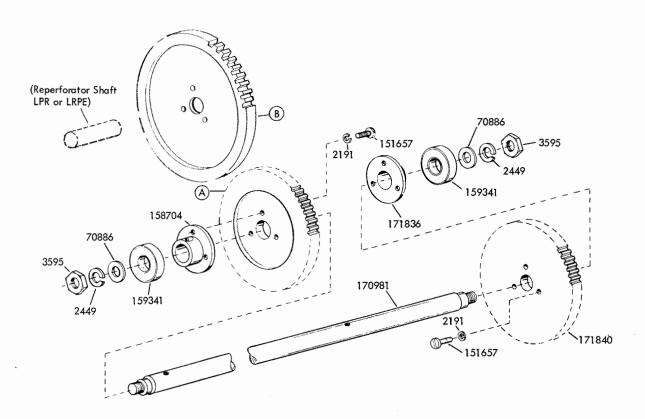


FIGURE 2-2. VARIABLE SPEED GEAR MECHANISMS



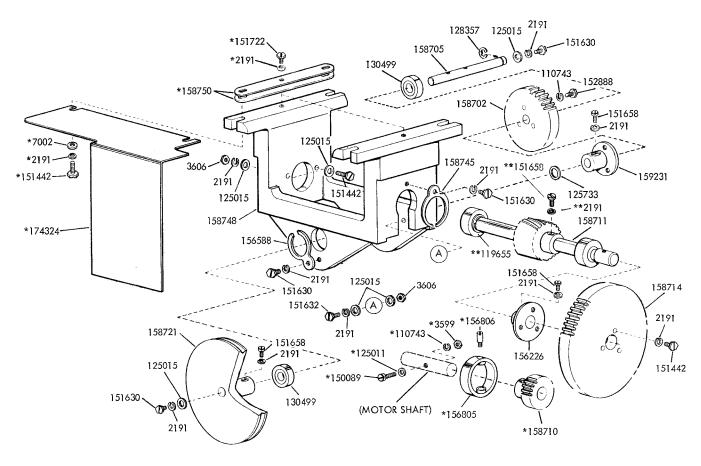
FIXED SPEED GEAR CHART										
FUNCTION	TRANS	REC	TRANS	REC	TRANS	REC	TRANS	TRANS	TRANS	TRANS
UNIT CODE	7.42	7.42	7.42	7.42	7.42	7.50	7.50	7.50	7.42	7.00
W.P.M.	100	75	75	60	60	67	67	100	100	75
BAUD	74.2	56.8	56.8	45.5	45.5	50	50	75	74.2	
GEAR (A)	158700	158700	158703	158700	158703	172630	172628	172628	158703	
GEAR B	158716	158734	158734	158733	158733	158716	158716	172905	158716	_
GEAR (C)		158732		158732						
GEAR (D)		-				158712				
SHAFT W/ E	160658	158713	158713	158713	158713	158713	158713	158713	170990	160658
GEAR F			158732		158732			172906		
GEAR (G)	160660						158712		158712	173696

FIGURE 2-3. FIXED SPEED GEAR MECHANISMS

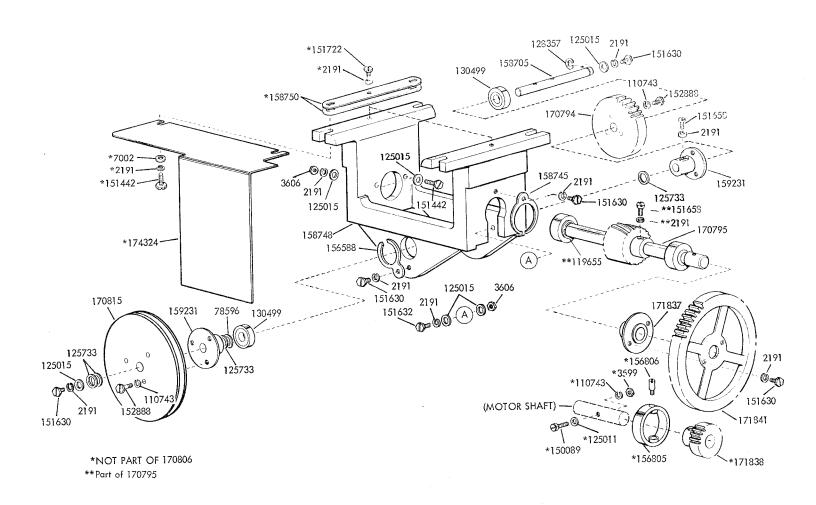


		INTERCHANGEABLE GEAR SETS FOR L/H RT SETS							
		Gear Sets	Gear "A"	Gear "B"					
Speeds	3600 RPM	171695 (60 WPM) 171696 (75 WPM) 171697 (100 WPM)	170767 170871 170769	170768 170872 170770					
Motor	3000 RPM	146953 (60 WPM) 146954 (75 WPM) 146951 (100 WPM)	146962 146960 146964	1 46963 1 46961 1 46965					

FIGURE 2-4. INTERCHANGEABLE CROSS SHAFT GEAR SETS



*NOT PART OF 159104 ASSEMBLY **Part of 158711



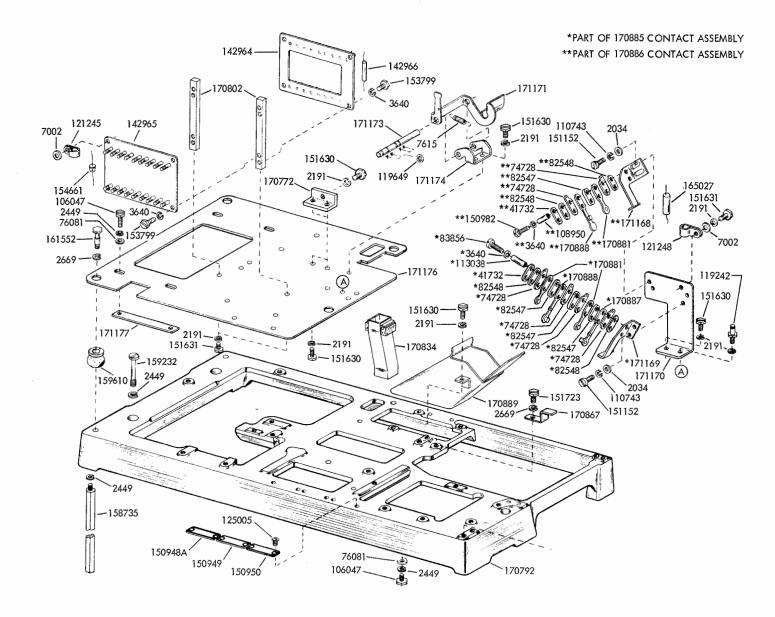


FIGURE 2-7. BASE (HIGH SPEED)

*The 193240 Plate is needed to mount the 193147 capacitor.

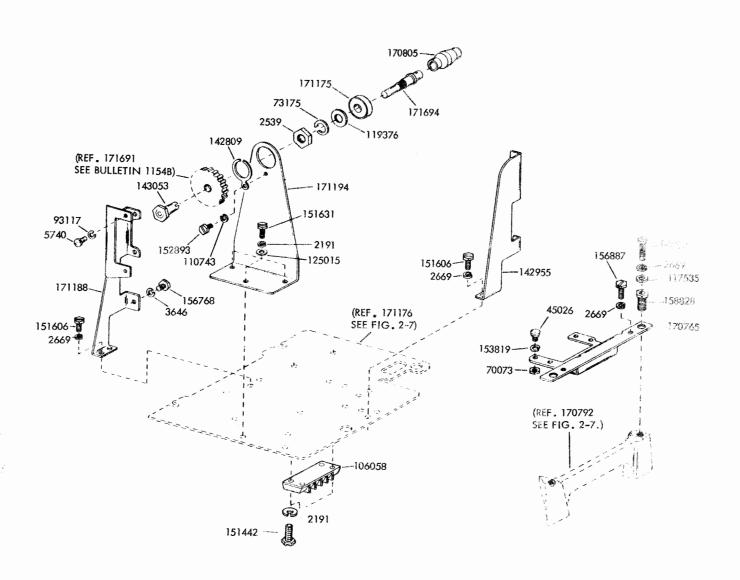


FIGURE 2-9. HIGH SPEED TAPE PUNCH (BRPE) MOUNTING DRIVE PARTS

*PART OF CABLE ASSEMBLY (SEE CHART ON PAGE 2-19)

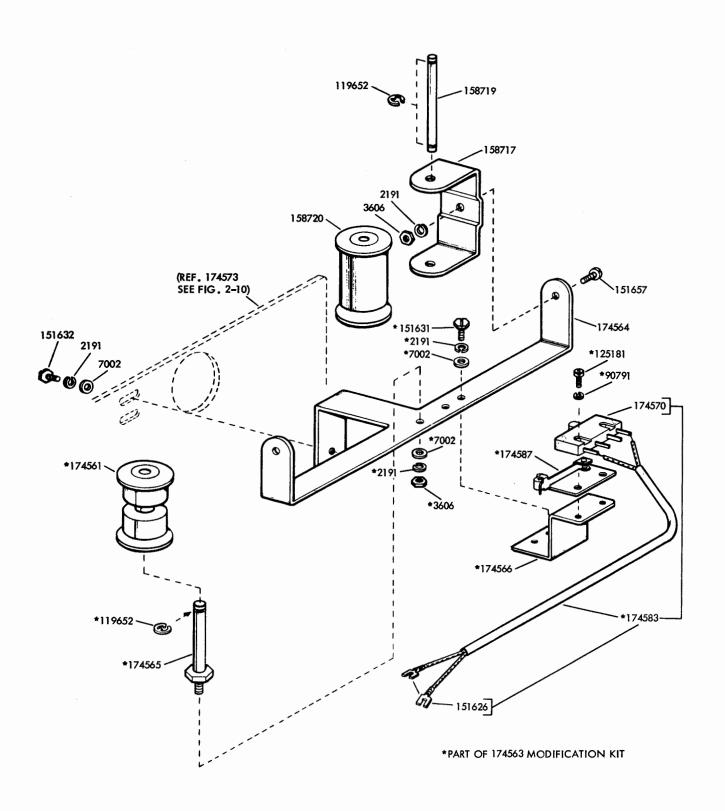


FIGURE 2-11. TAPE GUIDE AND TAPE-OUT ASSEMBLY

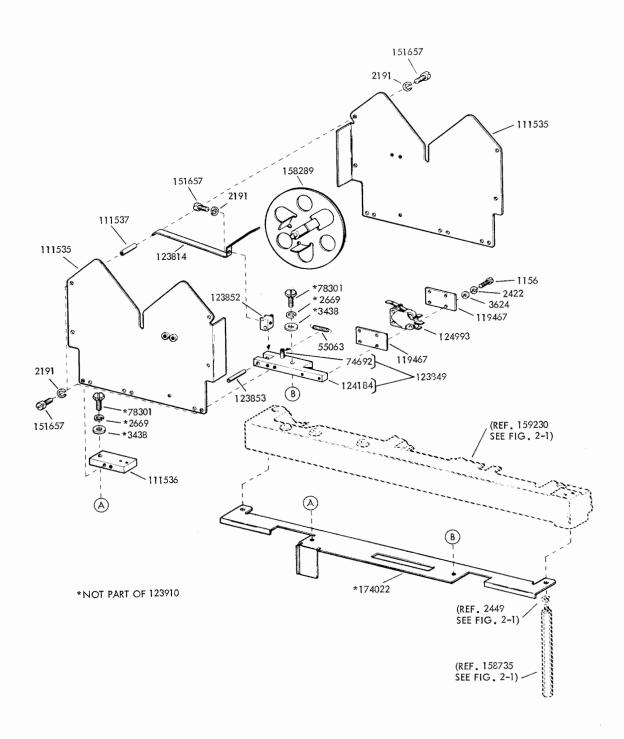


FIGURE 2-12. 123910 TAPE REEL CONTAINER

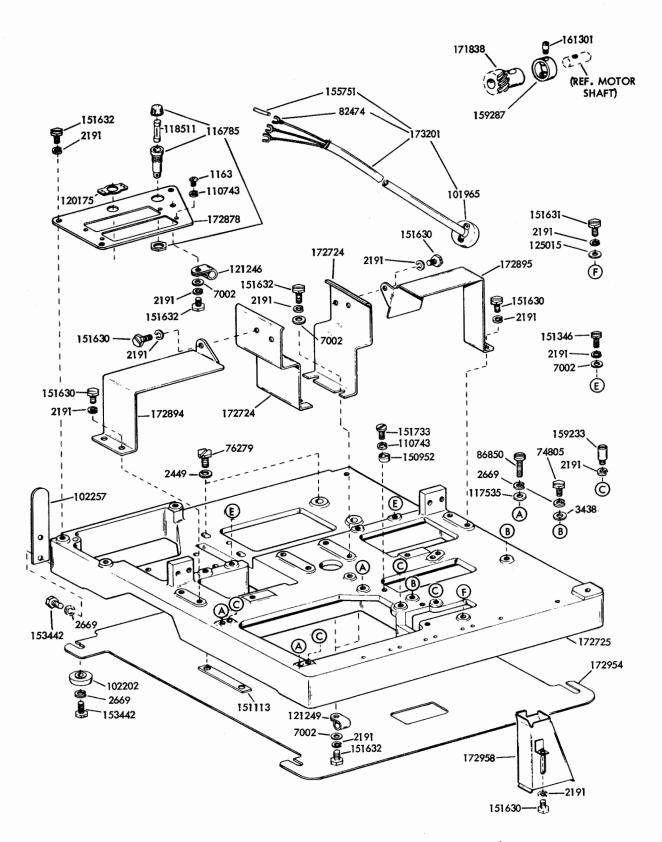


FIGURE 2-13. BASE (AC 205** CABINET APPLICATION)

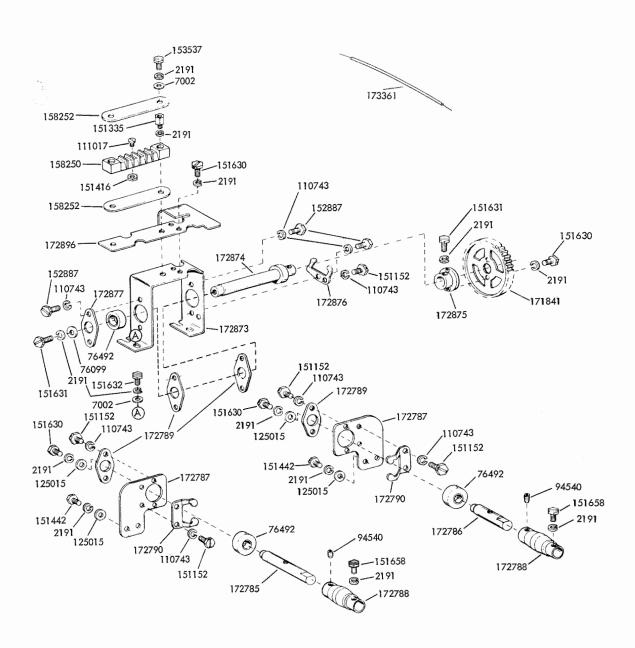


FIGURE 2-14. INTERMEDIATE SHAFT AND GEARS

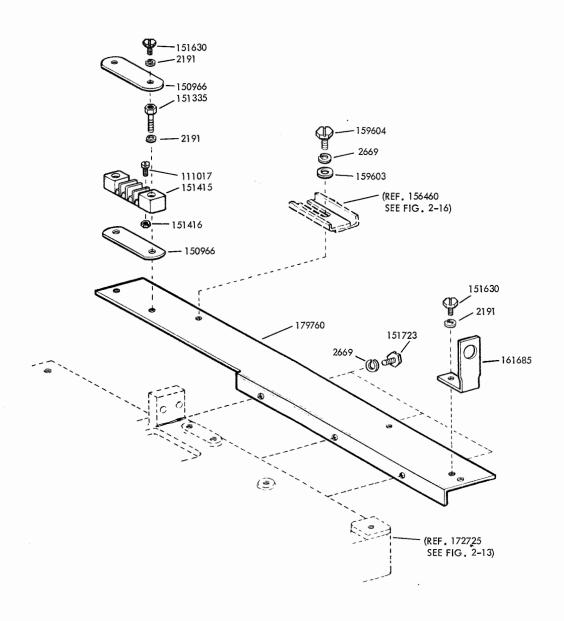


FIGURE 2-15. TAPE CONTAINER BRACKET AND TERMINAL BLOCK

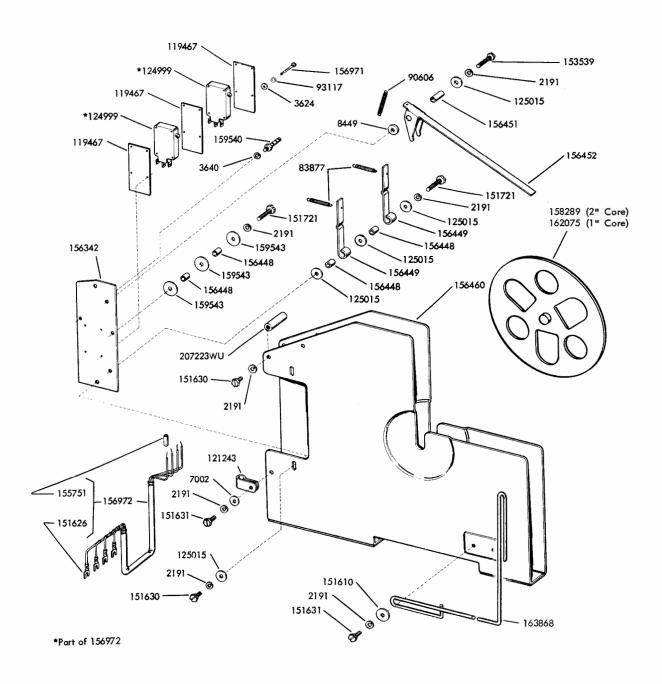


FIGURE 2-16. TAPE CONTAINER ASSEMBLY

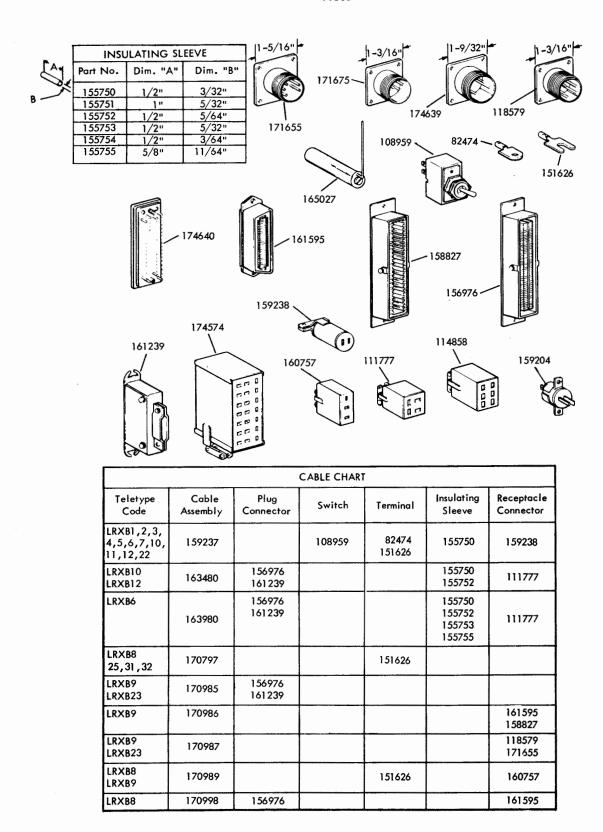


FIGURE 2-17. CABLE CHART

		CAE	BLE CHART (C	iont.)		
Teletype Code	Cable Assembly	Plug Connector	Switch	Terminal	Insulating Sleeve	Receptacle Connector
LRXB8	172108					171655
LRXB8	172110	161239				158827
LRXB13 LRXB15 LRXB16	172664	161239 156971		165027	155752 155750	111777
LRXB13 LRXB15 LRXB16	172665		108959	151626 82474	155750	159238
LRXB14	172987	156976 161239			155750	
LRXB14	172988			151626	155751	
LRXB17 LRXB27	173469	172276 156976 171951 161239			155750 155752 155753	111777
LRXB17 LRXB27	173761		108959	82474 151626		159238
LRXB22	174023	159204			155753	
LRXB20 LRXB25 LRXB21	174525			151626	155750	171675 174639
LRXB31,32	174585			151626	155750	171675 174639
LRXB20 ,21,25	174586			151626	155752	114858
LRXB20,26	174590				155754	174640 161595
LRXB21 LRXB25	174591	161239		151626	155753 155754	174640 174574
LRXB20	174592	161239		151626	155753 155754	174640 174574
	174594			151626	155754	174640 161595
LRXB23	178230			151626		114858
LRXB23	178246					
LRXB24	179944		108959		155752	
LRXB24	193640	161239 156976			155750 155754	
LRXB26	190497			82474		174640
LRXB31	190314	161239		151626	155754	174640
LRXB32	197567	161239		151626	155754	174640

FIGURE 2-18. CABLE CHART (CONTINUED)

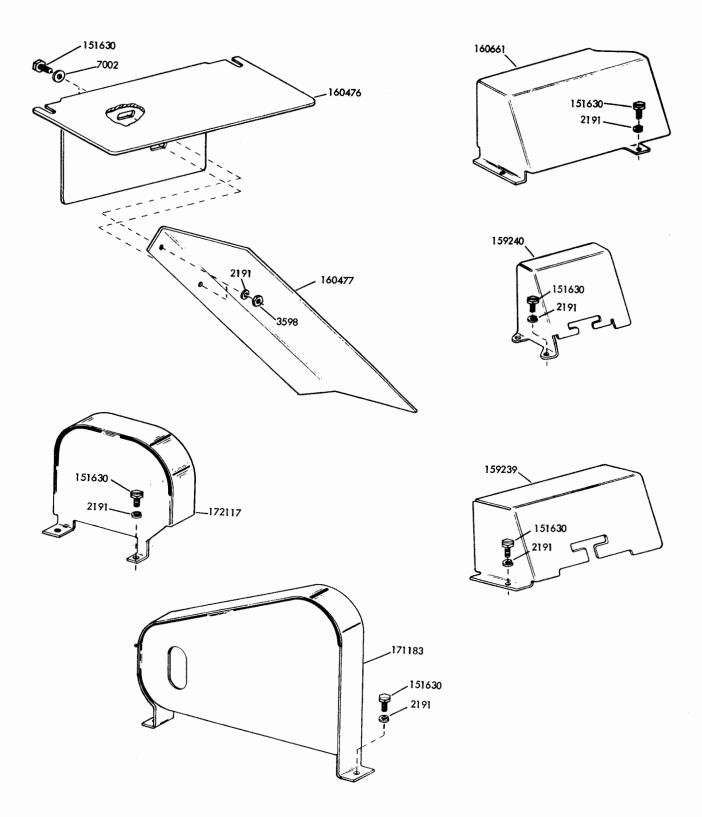
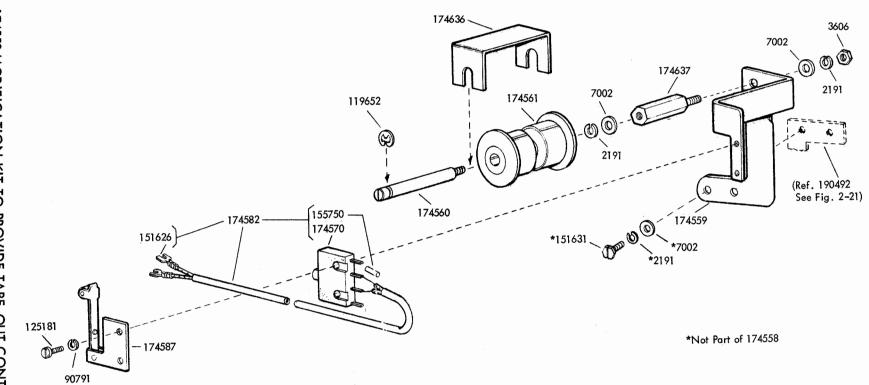
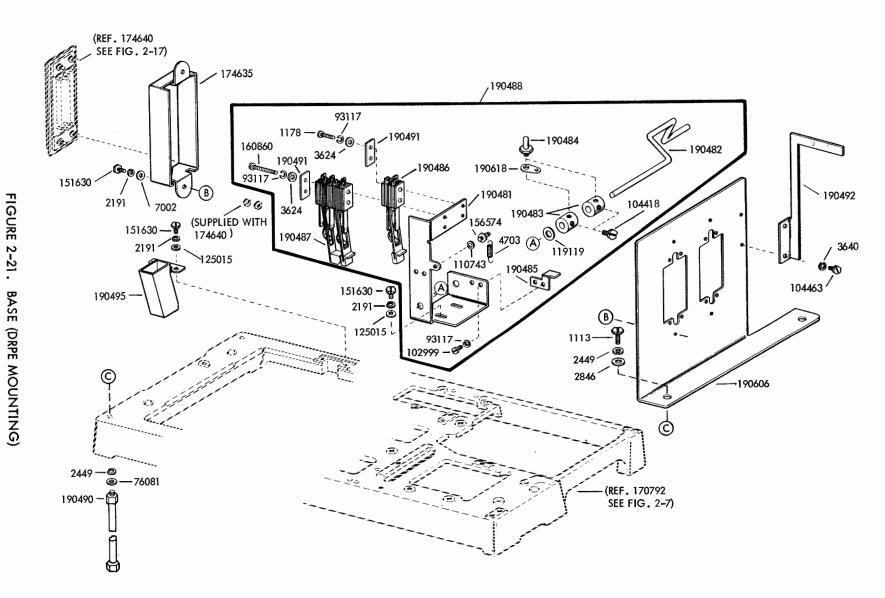


FIGURE 2-19. COVERS

FIGURE 2-20. 174558 MODIFICATION KIT TO PROVIDE TAPE-OUT CONTACTS AHEAD OF REPERFORATOR USED ON THE H/L RT SET





*NOT PART OF 190540 ASSEMBLY
**PART OF 190535

NUMERICAL INDEX - SECTION 2

Part	Description and	Part	Description and	Part Numbers	Description and Page Number
Numbers	Page Number	Numbers	Page Number	Numbers	rage Number
1113	Screw (1/4-20 x 7/8 Hex) 2-11,2-23	92260	Washer, Lock 2-3,2-4	125181	Screw (2-56 x 3/8 Fil) 2-12,2-21
1156	Screw (2-56 x 9/16 Fil) 2-13	93117	Washer, Lock 2-10,2-17,2-22	125237	Spring 2-3 ,2-23
1163	Screw (4-40 x 3/16 Fil) 2-2,2-14	94540	Screw, Set (10-24) 2-15	125733	Washer, Flat 2-6,2-7
1178	Screw (2-56 x 7/16 Fil) 2-22	101965	Connector, Plug (3 Pt) 2-14	128357 129852	Ring, Retaining 2-6,2-7,2-23
1268	Screw (6-40 x 5/16 Flat) 2-9	102202	Foot 2-14	130499	Resistor (2200 Ohm) 2-9 Bearing, Ball 2-3,2-4,2-6,2-7,
1 298 2034	Screw (8–32 x 1/4 Fil) 2–9 Washer, Flat 2–2,2–8	102257	Post 2-14 Screw (2-56 x 5/32 Fil) 2-22	1004//	2–23
2191	Washer, Lock 2-2 to 2-17,	102999 104418	Screw (4-40 x 5/32 Hex) 2-22	135637	Resistor (25 Ohm) 2-9
_,,,	2-20 to 2-23	104463	Screw (4-40 x 1/4 Hex) 2-22	142809	Clamp 2-10
2254	Washer, Flat 2-9	104807	Washer, Flat 2-11	142955	Bracket , Left 2-10
2422	Washer, Lock 2–13	106047	Screw (1/4-32 x 1/2 Hex) 2-8	142964	Board, Terminal 2-8,2-9,2-14
2449	Washer, Lock 2-2,2-5,2-8,2-11,	106058	Block, Terminal 2-10	142965	Board, Terminal 2-8,2-9
0500	2-14,2-23	108950	Bushing 2-8	142966 143053	Resistor (25 Ohm) 2-8 Hub 2-10
2539 2669	Nut (3/8-32 Hex) 2-10	110743	Washer, Lock 2-2,2-3,2-4,2-6,	146951	Gear Set 2–5
2007	Washer, Lock 2-3,2-8,2-9,2-10, 2-11, 2-13, 2-14, 2-16	111017	2-7,2-8,2-10,2-14,2-15,2-22,2-23	146953	Gear Set 2-5
2846	Washer, Flat 2-11,2-23	111017	Screw (6-40 x 5/16 Fil) 2-2, 2-9, 2-11,2-15,2-16	146954	Gear Set 2-5
3438	Washer, Flat 2-2,2-11, 2-13,	111535	Panel, Tape Container 2–13	146960	Gear (29T) 2-5
3595	Nut (1/4-32 Hex) 2-5	111536	Block, Mounting 2-13	146961	Gear (69T) 2-5
3598	Nut (6-40 Hex) 2-9,2-20	111537	Post 2-13	146962	Gear (42T) 2-5 Gear (80T) 2-5
3599	Nut (4-40 Hex) 2-6,2-7,2-23	111777	Connector, Receptacle (4 Pt) 2-18,	146963 146964	Gear (48T) 2-5
3606	Nut (6-40 Hex) 2-2,2-3,2-4,2-7, 2-8,2-12,2-21,2-23	110000	2-19	146965	Gear (70T) 2-5
3624	Washer, Flat 2-13,2-17,2-22	113038 114125	Bushing 2-8 Screw (6-40 x 3/8 Hex) 2-3	150089	Screw (4-40 x 1/2 Fil) 2-3,2-6,2-7,
3640	Washer, Lock 2-3,2-4,2-8,2-9,	114467	Connector, Plug (2 Pt) 2-2		2-23
	2-11,2-17,2-22	114858	Connector, Receptacle 2-18, 2-19	150411	Washer , Flat 2–9
3646	Washer, Lock 2–9, 2–10	116783	Holder, Fuse 2-14	150948A	Plate, Identification 2-8
4703	Spring 2-22	117535	Washer, Flat 2–2,2–10,2–14	150949	Plate, Identification (Serial) 2–8 Plate, Identification (Code) 2–8
5740 7002	Screw (2-56 x 1/4 Fil) 2-10 Washer, Flat 2-2 to 2-4, 2-6 to 2-9,	118511	Fuse (1/8 Amp) 2-14	150950 150952	Eccentric 2-2,2-14
7002	2-11, 2-12, 2-14 to 2-16, 2-20 to 2-24	118579 119119	Connector, Receptacle (5 Pt) 2–18 Washer, Flat 2–22	150966	Insulator (1-4) 2-2, 2-9, 2-16
7615	Spring 2-8	119242	Post, Spring 2-8	150982	Screw (4-40 x 7/16 Fil) 2-8
8330	Washer, Flat 2-2,2-8	119376	Washer, Flat 2-10	151113	Strip, Mounting 2-14
8449	Spacer (.094") 2 - 17	119467	Insulator (.032") 2-13, 2-17	151152	Screw (4-40 x 3/16 Hex) 2-8,2-15
41732	Plate, Clamp 2-8	119649	Ring, Retaining 2-8	151335	Stud 2-2,2-9,2-11,2-15,2-16 Screw (6-40 × 3/8 Fil) 2-2,2-3,2-4,
45026 55063	Screw, Shoulder (3-48) 2-10 Spring 2-13	119651	Ring, Retaining 2-3,2-10	151346	2-9,2-14
70073	Nut (3-48 Hex) 2-9,2-10	119652 119655	Ring, Retaining 2-2,2-3,2-8,2-21 Ring, Retaining 2-6,2-7,2-23	151411	Block, Terminal 2-11
70886	Washer, Flat 2–5	120175	Plate (OFF-ON) 2-2,2-14	151412	Insulator (1-9) 2-11
73175	Washer, Lock 2-10	121242	Clamp, Cable (1/8" ID) 2-2	151415	Block, Terminal 2-2,2-9,2-16
74692	Post, Spring 2-13	121243	Clamp, Cable (3/16" ID) 2-2, 2-17	151416	Nut (6-40 Hex) 2-2,2-9,2-11,2-15,
74728	Terminal , Contact 2-8	121244	Clamp, Cable (1/4 ID) 2-9, 2-12		2-16
74805 75750	Screw (10-32 x 3/4 Hex) 2-2,2-14	121245	Clamp, Cable (5/16" ID) 2-2, 2-8	151442	Screw (6-40 x 1/2 Hex) 2-3,2-4,
75081	Washer, Insulating 2–9 Washer, Flat 2–8,2–22	121246	2-9,2-14 Clamp, Cable (3/8" ID) 2-14	151606	2-6,2-7,2-10,2-15,2-23 Screw (10-32 x 1/4 Hex) 2-10
76099	Washer, Flat 2–15	121240	Clamp, Cable (3/8" ID) 2-14 Clamp, Cable (7/16" ID) 2-2	151610	Washer, Flat 2–17
76279	Screw $(1/4-32 \times 5/8 \text{ Hex}) 2-14$	121248	Clamp, Cable (1/2" ID) 2-8	151618	Screw (6-40 x 7/16 Fil) 2-3,2-4
75492	Bearing, Ball 2-15	121249	Clamp, Cable (5/8" ID) 2-11, 2-14	151626	Terminal 2-9, 2-12, 2-17, 2-18,
77902	Screw (6-40 x 1-3/8 Rd) 2-9	123814	Lever, Tape Out 2-13		2-19, 2-21
78 301	Screw (10-32 x 5/8 Hex) 2-13	123849	Block Assembly, Mounting 2-13	151630	Screw (6-40 x 1/4 Hex) 2-2,2-3,
78596 818 3 6	Washer, Friction 2–7,2–23 Washer, Insulating 2–9	123852 123853	Block Assembly 2-13		2-4,2-6,2-7,2-8,2-9,2-11,2-14, 2-15,2-16,2-17,2-20,2-22,2-23
82474	Terminal 2-14,2-18,2-19	123633	Pin 2-13 Container Assembly 2-13	151631	Screw (6-40 x 5/16 Hex) 2-2,2-8,
82547	Insulator (.094") 2-8	124177	Washer, Lock 2-3		2-9,2-10,2-11,2-15,2-17,2-21
82548	Insulator (.062") 2-8	124184	Block 2-13	151632	Screw $(6-40 \times 3/8 \text{ Hex}) 2-2,2-4$,
83856	Screw (4-40 x 11/16 Rd) 2-8	124993	Switch, Sensitive 2-13		2-6,2-7,2-8,2-9,2-11, 2-14, 2-15,
83877	Spring 2-17	124999	Switch, Sensitive 2-17	151657	2-23
86850	Screw (10-32 \times 1-1/4 Fil) 2-2,2-10, 2-14	125005 125011	Screw (2–56 × 3/16 Rd) 2–8 Washer, Flat 2–6,2–7,2–23	151657	Screw (6-40 x 1/4 Fil) 2-2,2-3,2-4, 2-5,2-9,2-12,2-13
90606	Spring 2-17	125015	Washer, Flat 2-2,2-3,2-4,2-6,2-7,	151658	Screw (6-40 × 5/16 Fil) 2-3,2-4,
90791	Washer, Lock 2–12,2–21		2-9,2-10,2-14,2-15,2-17.2-22.2-23		2-6,2-7,2-15,2-23

NUMERICAL INDEX - SECTION 2 (CONTINUED)

	m eve and	ъ.	Description and	Part	Description and
Part	Description and Page Number	Part Number	Page Number 234214	Number	Page Number
Number	rage radiiber	1 (0111501 -			
151660	Screw (6-40 × 7/8 Fil) 2-2		Gear (14T) 2-6	160476	Cover 2-20
151688	Screw (4-40 x 5/8 Fil)2-2	158711		160477 160657	Shield 2–20 Bracket 2–4
151692	Carrow /4-40 v 3/14 Eil\ 2-2	158712	Gear (26T) 2-3,2-4		Shaft w/Bearings and Gear 2-3,2-4
151721	Screw (6-40 x 3/4 Hex) 2-17	158713	Shaft w/Bearings and Gear 2-3,2-4,		Gear (27T) 2-4,2-6
151722	C 16 10 x 3/16 Hav 2-6 2-7	158714 ·			Cover 2-20
	2-9,2-23	158716	*.	160757	Connector, Receptacle (3 Pt) 2–18
151723	Screw $(10-32 \times 3/8 \text{ Hex}) 2-8, 2-11,$	158717	Bracket 2-2,2-8,2-12		Screw (2-56 x 7/8 Fil) 2-22
N TA	2-16	158718	Bracket 2-2	161239	Connector, Plug (36 Pt) 2-18,2-19
151732	Screw (4-40 x 11/32 Fil) 2-3,2-4	158719	Shaft 2-2,2-8,2-12	161301	Post 2-14
1.51.733	Screw (4-40 x 9/16 Fil) 2-14	158720	Roller 2-2, 2-8, 2-12	161552	Screw (10-32 Spl) 2-8, 2-9
151827		158721	Pulley 2-6	161595	Connector, Receptacle (36 Pt) 2-18,
152887	Screw (4-40 x 7/16 Hex) 2-6,2-7,2-23	158722	Hub 2-4	1/1/05	2-19
152888 152893	Screw (4-40 x 1/4 Hex) 2-10,2-11,	158723	Roller 2-3	161685	Bracket, Switch 2-16
132973	2-23	158724	Stud-2-3	162075 (163258	Reel, Tape 2-17
153442	Screw (10-32 x1/2 Hex) 2-14	158725	Arm 2-3	163259	Gear (47T) 2-3 Plate, Locating 2-3
153537	Screw (6-40 x 9/32 Hex) 2-15	1 <i>5</i> 8 <i>727</i> 1 <i>5</i> 8 <i>7</i> 28	Post 2-3 Shaft w/Bearing 2-4	163261	Gear (22T) 2-3
153539	Screw (6-40 x 11/16 Hex) 2-17	158729	Stud 2-3	163263	Roller 2-3
153631	Network, Spark Suppression 2–9	158732	Gear (18T & 24T) 2-3,2-4	163265	Block 2-3
153799	Screw (4-40 x 21/64 Hex) 2-8,2-9	158733	Gear (44T) 2=3,2-4	163357	Shaft w/Bearings and Gear 2-3
153819	Washer, Lock 2-9,2-10	158734	Gear (47T) 2-3,2-4	163469	Plate , Locating 2–3
153841	Screw (6-40 x 9/16 Hex) 2-3,2-4	158735	Post 2-2,2-8	163470	Gear (34T) 2-3
154661	Diode 2-8	158736		163471	Gear (24T) 2-3
155750	Sleeve, Insulating (3/32 ID x 1/2" Lg)	158737	Shaft w/Bearing 2-3	163472	Gear (42T) 2-3
	2-18, 2-19, 2-21 Sleeve, Insulating (1/8 ID × 1"Lg)	158738	Spacer 2-3	163473	Gear (26T & 20T) 2-3
155751	2-14, 2-17, 2-18, 2-19	158739		163474	Gear (60T) 2-3
155752	Sleeve, Insulating (5/64 ID × 1/2" Lg)	158740 158741	Block 2-3	163475 163480	Gear (34T) 2-3 Cable Assembly 2-18
133/32	2-18, 2-19	158742	Plate , Locating 2–3	163868	Guide, Tape 2-17
155753	Sleeve, insulating (1/8 ID x 1/2" Lg)	158744	Arm 2-2	163980	Cable Assembly 2-18
100700	2-18, 2-19	158745	Clamp, Bearing 2-6, 2-7, 2-23	165027	Network, Spark Suppression 2-8,
155754	Sleeve, Insulating (1/16 ID x 1/2" Lg)	158748	Bracket 2-6,2-7,2-23		2-18,2-19
	2-18, 2-19	158750	Shim (.003") 2-6, 2-7, 2-23	170765	Bracket , Connector 2-10
155755	Sleeve, Insulating (11/64 ID x 5/8"Lg)	158827	Connector, Receptacle (32 Pt.)	170767	Gear (28T) 2-5
198 198	2-18	55.00	2-18, 2-19 ·	170768	Gear (80T) 2-5
156226	Hub 2-4,2-6,2-23	158828	Bushing, Mounting 2-10	170769	Gear (32T) 2-5
156342	Plate 2-17	159104	Bracket Assembly, Tape Winder	170770	Gear (56T) 2-5
156448	Bushing 2-17	150110	Drive 2-6	170772	Block 2–8
156449	Lever, Switch 2-17	159110	Bracket Assembly, Front Tape 2-2	170792 170794	Base 2-8
156451	Bushing 2-17	159111 159204	Bracket Assembly, Rear Tape 2-2 Connector, Plug (2 Pt) 2-18, 2-19	170795	Gear (40T) 2–7 Shaft w/Bearings and Gear 2–7
156452 156460	Lever, Tape 2-17 Panel 2-17	159230	Base 2-2	1 <i>7</i> 0797	Cable 2-18
156574	Post, Spring 2-22	159231	Hub, Gear 2-3, 2-4, 2-6, 2-7, 2-23	170802	Post 2-8,2-9
156588	Ring, Retaining 2-3,2-4,2-6,2-7,	159232	Screw, Captive (1/4-20) 2-2,2-8	170805	Coupling , Flexible 2-10
The state of the s	2-23	159233	Stud 2-2,2-14	170806	Bracket Assembly 2-7
156740	Screw (6-40 x 7/32 Hex) 2-9	159237	Cable Assembly 2-18	170815	Pulley 2-7
156768	Screw (8-32 x 9/32 Hex) 2-10	159238	Connector, Receptacle (2 Pt) 2-18,	170834	Chute, Chad 2–8
156805	Retainer, Pinion 2-6,2-7,2-23		2-19	170863	Mount, Vibration 2-9
156806	Post 2-6,2-7,2-23	159239	Cover, Gear 2-20	170867	Bracket 2-8
156887	Screw (10-32 x 9/16 Hex) 2-10	159240	Cover, Gear 2-20	170869	Bracket Assembly, Front Tape 2-2
156971	_ Triggs (= Trib + 7 + 100 = 100 = 100 .	159242 159287	Screw, Shoulder (6-40) 2-2,2-8	170871 170872	Gear (35T) 2–5 Gear (80T) 2–5
156972 156976	Cable Assembly 2-17 Connector Plug (32 Pt) 2-18 2-19	159341	Retainer, Pinion 2-14 Bearing, Ball 2-5	1708/2	Spring, Contact 2–8
158250	Connector, Plug (32 Pt) 2–18, 2–19 Block, Terminal 2–15	159540	D + C + O 17	170887	Spring, Contact 2–8
158252	Insulator (1-6) 2-15	159543	Washer, Flat 2–17	170888	Spring, Contact 2-8
158289	Reel, Tape 2-13,2-17	159603	Washer, Captive 2–16	170889	Chute, Tape 2–8
158700	Gear (30T) 2-3,2-4	159604	Screw (10-32 × 1/2 Hex) 2-16	170891	Bracket 2-4
158702	Gear (40T) 2-6	159610	Mount, Vibration 2-8, 2-9	170975	Chute, Chad 2-9
158704	Hub 2-4	159819	Connector, Plug (32 Pt) 2-2	170981	Shaft 2-5
158705	Shaft , Tape Winder 2–7, 2–23	159820	Connector, Receptacle (32 Pt) 2–2	170985	Cable Assembly 2-18

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Part	Description and	Part	Description and	Part	Description and
Numbers	Page Number	Numbers	Page Number	Number	s Page Number
170986	Cable Assembly 2 10	172788	Coupling 2-15	174586	Cable Assaults 2.10
170787	Cable Assembly 2–18 Cable Assembly 2–18	172789	Clamp, Bearing 2-15	174587	Cable Assembly 2–19 Actuator, Switch 2–21
170989	Cable Assembly 2-18	172790	Clamp, Bearing 2-15	174590	Cable Assembly 2-19
170990	Shaft w/Bearings and Gear 2–4	172871	Shaft w/Bearings and Gear 2-3	174591	Cable Assembly 2-19
170998	Cable Assembly 2-18	172873	Bracket 2-15	174592	Cable Assembly 2-19
171168	Bracket 2–8	172874	Shaft w/Bearing 2-15	174594	Cable Assembly 2-19
171169	Bracket 2-8	172875	Hub 2-15	174595	Block, Terminal 2-?
171170	Bracket 2-8	172876	Clamp 2-15	174635	Shield, Connector 2-11,2-22
171171	Bail, Tape Depressor 2-8	172877	Clamp 2-15	174636	Bracket , Tape Guide 2-21
	Shaft 2-8	172878	Plate 2-14	174637	Spacer 2-21
171173 171174	Bracket 2-8	172892	Plate, Locating 2-3	174639	Connector, Receptacle (3 Pt) 2–18
171175	Bearing, Ball 2-10	172894	Cover, Gear 2-14	174640	Connector, Receptacle (50 Pt) 2-11,
171176	Plate, Base 2-8	172895	Cover, Gear 2-14		2-18,2-19,2-22
1 <i>7</i> 11 <i>77</i>	Plate, Nut 2-8	172896	Bracket 2-16	1 <i>7</i> 5185	Screw (6-40 × 4-1/2 Rd) 2-9
171183	Cover 2-20	172905	Gear (34T) 2-3,2-4	176244	Bracket 2-2
171187	Bracket 2-2	172906	Gear (34T) 2-3	176245	Tape Bracket Assembly 2-2
171188	Bracket 2-10	172907	Spacer 2–3	177445	Diode 2-9
171194	Bracket w/Bearing 2-10	172954	Plate, Base 2-14	178230	Cable Assembly 2-19
171195	Post 2-9	172958	Chute, Tape 2-14,2-15	178246	Cable 2-19
171196	Rail, Left 2-9	172987	Cable Assembly 2-19	178396	Bracket 2-2,2-4
171197	Rail, Right 2-9	172988	Cable w/Terminals 2-19	179059	Chute, Tape 2-2
171198	Plate, Base 2-9	173201	Cable Assembly 2-14	179760	Bracket 2-16
171199	Chute, Tape 2-9	173361	Jumper (5 1/2" Lg.) 2-15	179944	Cable Assembly 2-19
171205	Bracket , Connector Mounting 2–9	173469	Cable Assembly 2-19	179980	Plate, Locating 2-3
171469	Resistor (100 Ohm) 2-9	173692	Pinion (30 T) 2-3	190314	Cable Assembly 2-19
171541	Diode 2-9	173693	Gear (42T) 2-3	190481	Bracket, Switch 2-22
171655	Connector, Plug (5 Pt) 2-18,2-19	173696	Gear (45T) 2-4	190482	Arm, Tape 2-22
171675	Connector, Plug (3 Pt) 2-11,2-18,	173702	Plate, Locating 2-3	190483	Collar 2-22
	2-19	173761	Cable 2-19	190484	Post, Contact Operating 2-22
171694	Shaft 2–10	174022 174023	Bracket, Mounting 2-13	190485	Bracket, Stop* 2-22
171695	Gear Set 2-5		Cable Assembly 2-19	190486	Switch 2-22
171696	Gear Set 2-5	174094 174324	Resistor (25 Ohm) 2-9	190487	Switch 2-22
171697	Gear Set 2-5	174525	Shield, Oil 2-6,2-7,2-23	190488	Contact Assembly, Tight Tape 2-22
171705	Guard, Gear 2–9	174547	Connector, Plug (50 Pt) 2-19	190490	Post 2-22
1 <i>7</i> 1836 1 <i>7</i> 1837	Hub 2-5	174558	Plate, Base 2-9	190491	Spacer 2-22
171838	Hub 2-7 Gear (28T) 2-7,2-14,2-23	174559	Modification Kit 2–21 Bracket 2–21	190492	Bracket, Tape Guide 2-22
171841	Gear (84T) 2-7,2-15	174560	Stud 2-21	190495	Chute, Chad 2-22
171951	Connector, Shielding 2-19	174561	Roller 2-12,2-21	190497	Cable 2-19
172108	Cable Assembly 2-19	174562	Plate 2-9	190523	Pulley 2-23
172110	Cable Assembly 2-19	174563	Modification Kit to Provide Tape-	190531	Gear (40T) 2-23
172117	Cover 2-20		Out Contacts Ahead of Reperforator	190534	Hub 2-23
172628	Gear (19T) 2-4		On Low-to-High R/T 2-12	190535	Shaft w/Bearings and Gear 2-23
172630	Gear (24T) 2-4	174564	Bracket 2-12	190540 190586	Bracket Assembly 2-23
172664	Cable Assembly 2–19	174565	Stud 2-12	190606	Disk, Retaining 2-23
172665	Cable 2-19	174566	Bracket 2-12	190618	Plate, Rear Connector 2-22 Terminal 2-22
172724	Bracket 2–14	174570	Switch 2-12,2-21	193147	Capacitor (.25MFD) 2-9
172725	Base 2-14	174573	Plate, Connector 2-11	193270	Plate, Base 2-9
172784	Bracket 2-3	174574	Connector, Plug (21 Pt) 2-18, 2-19	193640	Cable Assembly 2-19
172785	Shaft 2-15	174582	Cable Assembly 2-21	197567	Cable Assembly 2-19
172786	Shaft 2-15	174583	Cable Assembly 2-12		Spacer 2-17
172787	Plate 2-15	174585	Cable Assembly 2-19		

SECTION 3

MOTOR UNIT

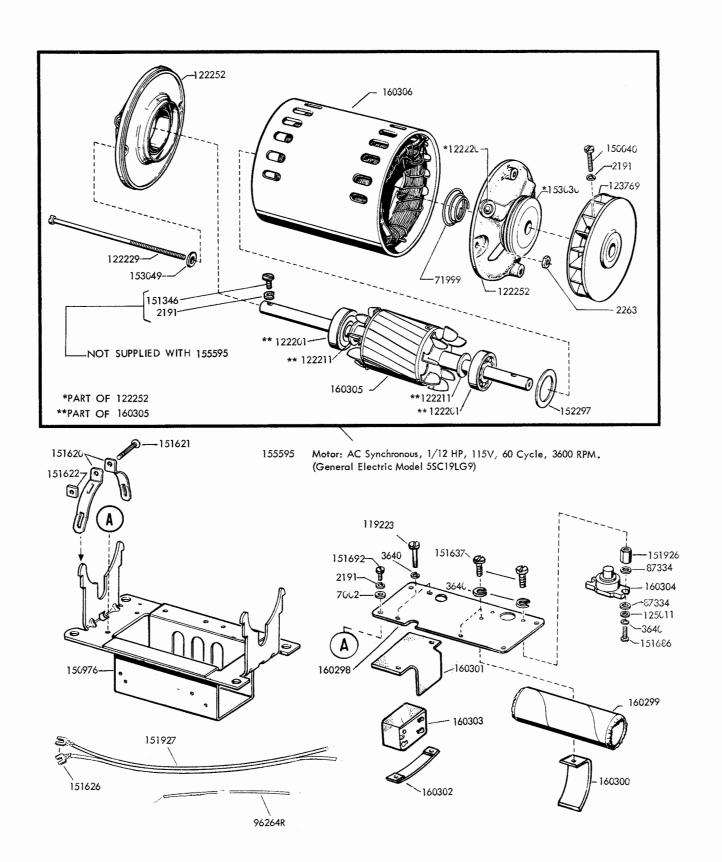


FIGURE 3-1. LMU11 SYNCHRONOUS MOTOR UNIT

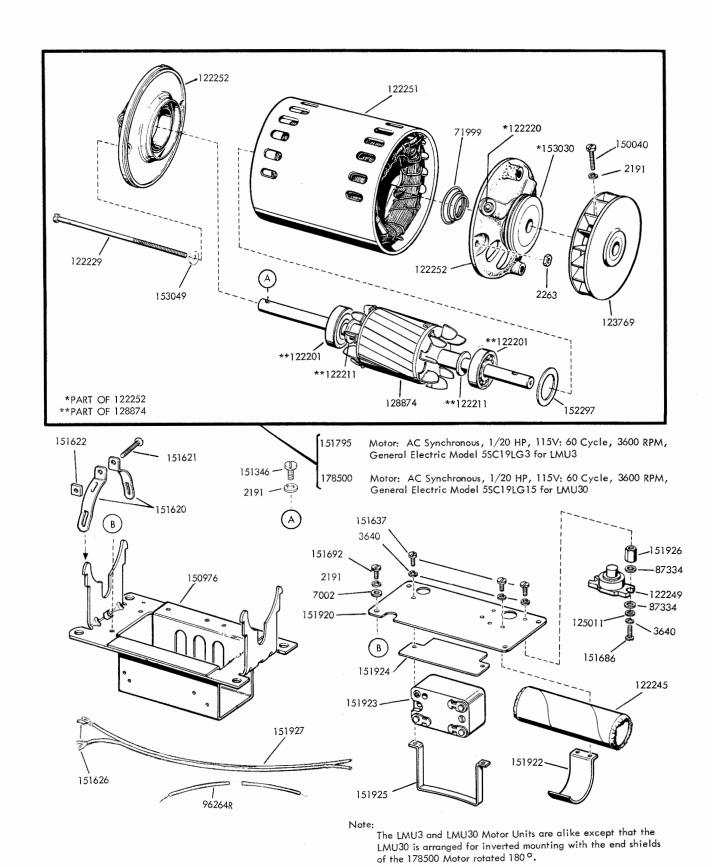


FIGURE 3-2. LMU3 AND LMU30 SYNCHRONOUS MOTOR UNITS

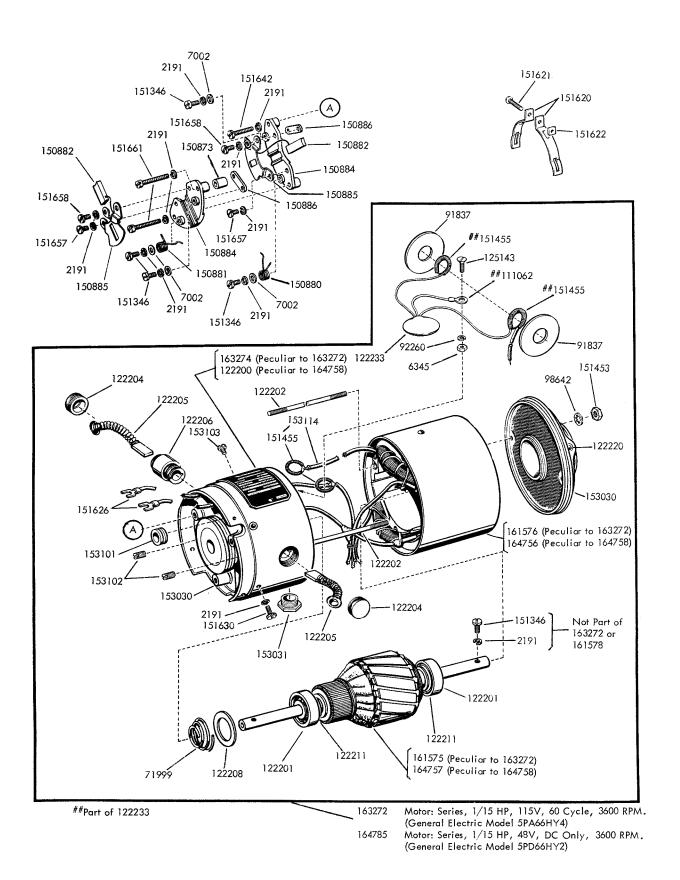
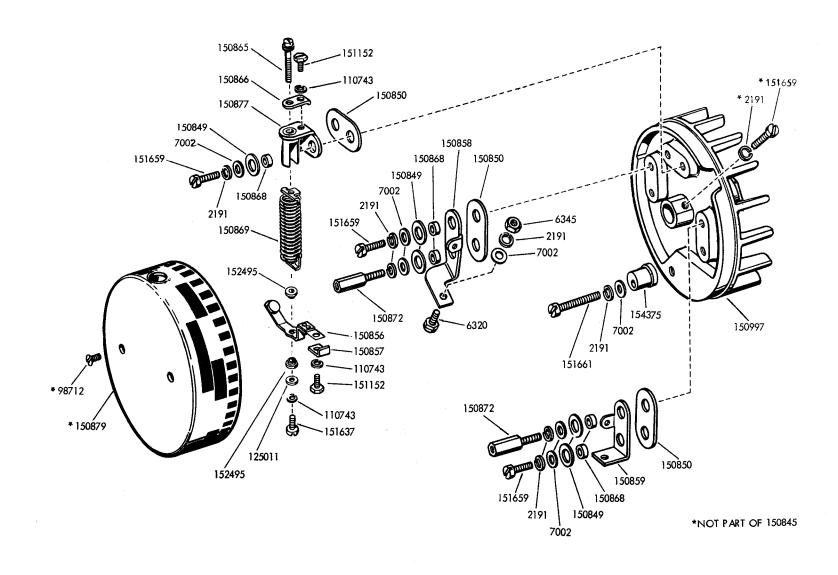


FIGURE 3-3. SERIES MOTORS





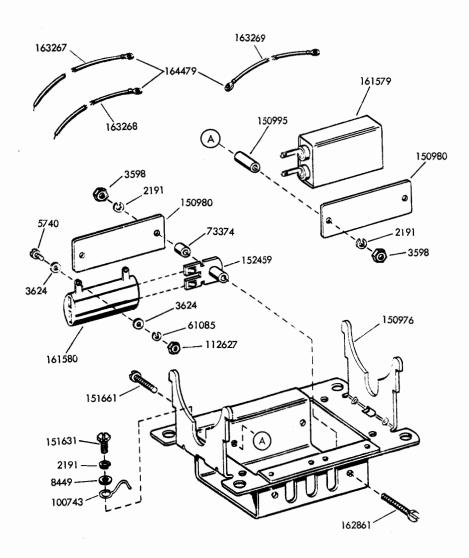


FIGURE 3-5. SERIES MOTOR MOUNTING PARTS

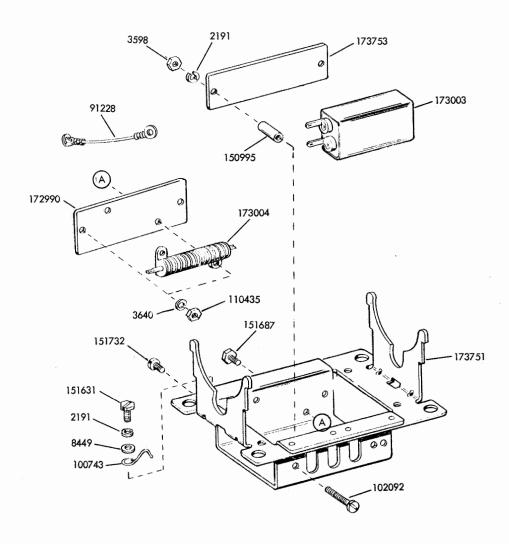


FIGURE 3-6. SERIES MOTOR MOUNTING PARTS

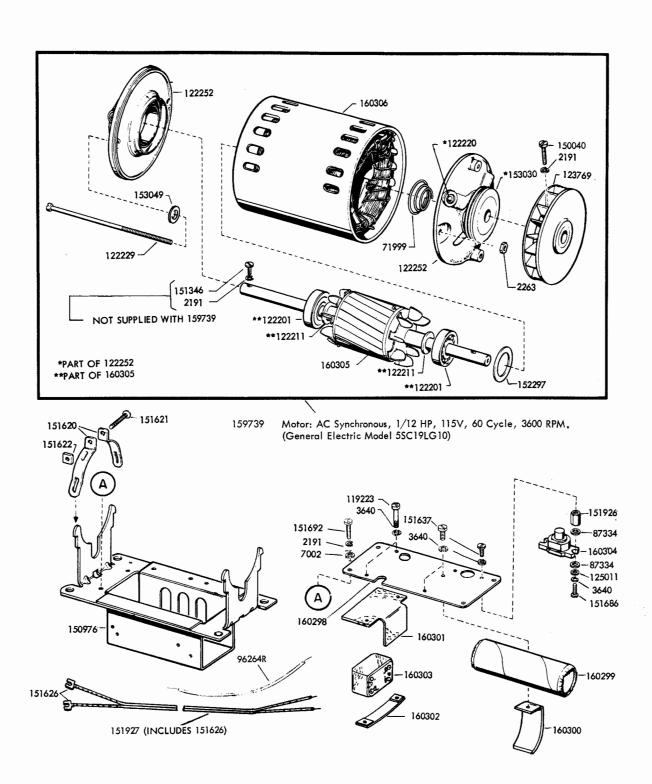


FIGURE 3-7. LMU12 SYNCHRONOUS MOTOR UNIT

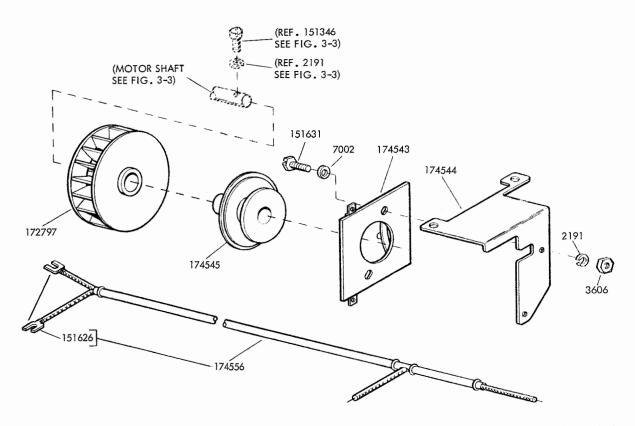


FIGURE 3-8. 174546 MODIFICATION KIT TO PROVIDE MOTOR "RUNNING" CONTACTS

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David	Description and	Part	Description and	Part	Description and
Part Number	Page Number	Number	Page Number	Number	Page Number
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2263	Nut (8-32 Hex) 3-2,3-3,3-8	150856	Arm, Contact 3–5	151926	Nut (4-40 Spl) 3-2,3-3,3-8
3598	Nut (6-40 Hex) 3-6,3-7	150857	Clamp, Contact Arm 3–5	151927	Cable w/Terminals 3-2,3-3,3-8
3606	Nut (6-40 Hex) 3-9	150858	Bracket, Contact 3–5	152297	Washer, Flat 3–2,3–3,3–8
3624	Washer, Flat 3-6	150859	Bracket, Mounting 3–5	152459	Bracket, Mounting 3–6
3640	Washer, Lock 3-2,3-3,3-7,3-8	150865	Screw, Clamping (4-40) 3-5	152495	Bushing 3-5
5740	Screw (2-56 x 1/4 Fil) 3-6	150866	Clamp, Screw 3-5	153030	Mount, Vibration 3-2,3-3,3-4
6320	Screw, Contact 3-5	150868	Bushing, Insulating 3-5	153031	Bushing, Lead 3-4
6345	Nut (6-32 Hex) 3-4,3-5	150869	Spring, Governor 3-5	153049	Washer, Fiber 3–2,3–3,3–8
7002	Washer, Flat 3-2,3-3,3-4,3-5,	150872	Stud 3-5	153101	Grommet 3-4
7002	3-8,3-9	150873	Collar 3-4	153102	Screw, Set (8 - 32) 3 - 4
8449	Collar 3-6,3-7	150877	Bracket 3–5	153103	Screw, Self Tapping 3–4
61085	Washer, Lock 3–6	150879	Cover, Governor 3-5	153114	Wire Assembly 3-4
71999	Spring, Thrust 3-2, 3-3, 3-4, 3-8	150880	Spring, Governor Brush 3-4	155595	Motor, AC Synchronous 3–2
73374	Spacer 3-6	150881	Spring, Governor Brush 3-4	159739	Motor, Synchronous 3-8
87334	Washer, Insulating 3–2,3–3,3–8	150882	Brush, Contact 3-4	160298	Plate, Mounting 3–2,3–8
91228	Strap 3-7	150884	Mounting, Brush 3-4	160299	Capacitor (170–226 mf) 3–2,3–8
91837	Washer, Fiber 3–4	150885	Plate, Brush 3-4	160300	Clamp 3-2,3-8
92260	Washer, Lock 3-4	150886	Plate, Clamp 3-4	160301	Plate, Insulating 3–2,3–8
96264R	Strap (5" Red) 3-2,3-3	150976	Bracket, Motor 3-2,3-3,3-6,3-8	160302	Plate, Nut 3 – 2,3 – 8
98642	Washer, Lock 3-4	150980	Plate, Clamping 3–6	160303	Relay 3-2,3-8
98712	Screw (4–40 × 7/32 Flat) 3–5	150995	Bushing 3-6,3-7	160304	Switch, Thermostatic 3-2,3-8
100743	Clamp, Cable 3-6,3-7	150997	Fan, Governor 3-5	160305	Rotor 3-2,3-8
102092	Screw (6-40 x 1-17/32 Rd) 3-7	151152	Screw (4-40 x 3/16 Hex) 3-5	160306	Stator 3-2,3-8
110435	Nut (4-40 Hex) 3-7	151346	Screw (6-40 x 3/8 Fil) 3-2,3-3,3-4,	161575	Armature 3–4
110433	Washer, Lock 3–5		3–8	161576	Stator 3–4
1110/43	Terminal 3-5	151453	Nut (10-32 Hex) 3-4	161579	Capacitor (.5 mf) 3-6
111002	Nut (2-56 Hex) 3-6	151455	Spring, Clip 3-4	161580	Resistor (500 ohms) 3-6
119223	Screw (4-40 x 1-15/32 Fil) 3-2,3-8	151620	Strap, Mounting 3-2,3-3,3-4,3-8	162861	Screw (6-40 × 1-5/16 Fil) 3-6
122201	Bearing, Ball 3-2,3-3,3-4,3-8	151621	Screw $(6-32 \times 3/4 \text{ Rd}) 3-2,3-3,3-4,$	163267	Jumper w/Terminal 3-6
122201		101021	3-8	163268	Jumper w/Terminal 3-6
122202	Bolt, Clamping 3–4 Cap, Brush 3–4	151622	Nut (6-32 Sq) 3-2,3-3,3-4,3-8	163269	Jumper w/Terminal 3-6
122204	Brush w/Spring 3-4	151626	Terminal 3-2,3-3,3-4,3-9	163272	Motor, AC Series (115V) 3-4
122205	· • -	151631	Screw $(6-40 \times 5/16 \text{ Hex}) 3-6,3-7,$	163274	Shield Assembly, End 3-4
122208	Holder, Brush 3–4 Washer, Flat 3–4		3-9	164479	Terminal 3-6
122208		151637	Screw $(4-40 \times 1/4 \text{ Fil}) 3-2,3-3,$	164756	Stator 3–4
122220	Washer, Pull 3-2,3-3,3-4,3-8 Oiler, Ball 3-2,3-3,3-4,3-8		3-5,3-8	164757	Armature 3–4
122229	Bolt (8-32 x4-11/16 Fil) 3-2,3-3,	151642	Screw (6-40 x 3/4 Fil) 3-4	164758	Motor, DC Series (48V) 3-4
122227	3-8	151657	Screw (6-40 x 1/4 Fil) 3-4	172797	Fan 3-9
122233	Capacitor Assembly 3–4	151658	Screw (6-40 x 5/16 Fil) 3-4	172990	Plate 3-7 .
122245	Capacitor (45 mf) 3-3	151659	Screw (6-40 x 1/2 Fil) 3-5	173003	Capacitor (1 mf) 3-7
122243	Stator 3-3	151661	Screw (6-40 x 1 Fil) 3-4,3-5,3-6	173004	Resistor (100 ohms) 3-7
122252	Shield Assembly, End 3-2,3-3,3-8	151686	Screw (4-40 x 3/8 Fil) 3-2,3-3,3-8	173751	Bracket, Motor 3–7
123769	Fan, Motor 3-2,3-3,3-8	151687	Screw (4-40 x 7/16 Hex) 3-7	173753	Plate 3–7
125011	Washer, Flat 3–2,3–3,3–5,3–8	151692	Screw (6-40 × 3/16 Fil) 3-2,3-8	174543	Switch 3-9
125143	Screw (6-32 x 5/16 Flat) 3-4	151732	Screw (4-40 × 11/32 Fil) 3-7	174544	Bracket 3–9
128874	Rotor 3-3	151795	Motor, AC Synchronous 3-3	174545	Rotor Assembly 3-9
150040	Screw (6-40 × 5/8 Fil) 3-2,3-3,3-8	151920	Plate, Mounting 3-3	174546	Modification Kit 3–9
150845	Governor Assembly 3-5	151922	Clamp 3-3	174556	Cable Assembly 3-9
150849	Washer, Insulating 3–5	151923	Relay 3-3	178500	Motor, AC Synchronous 3-3
150850	Plate, Insulating 3–5	151924	Insulator 3–3		·
100000	riars, moraring 0-0				

SECTION 4

CABINET

4-1

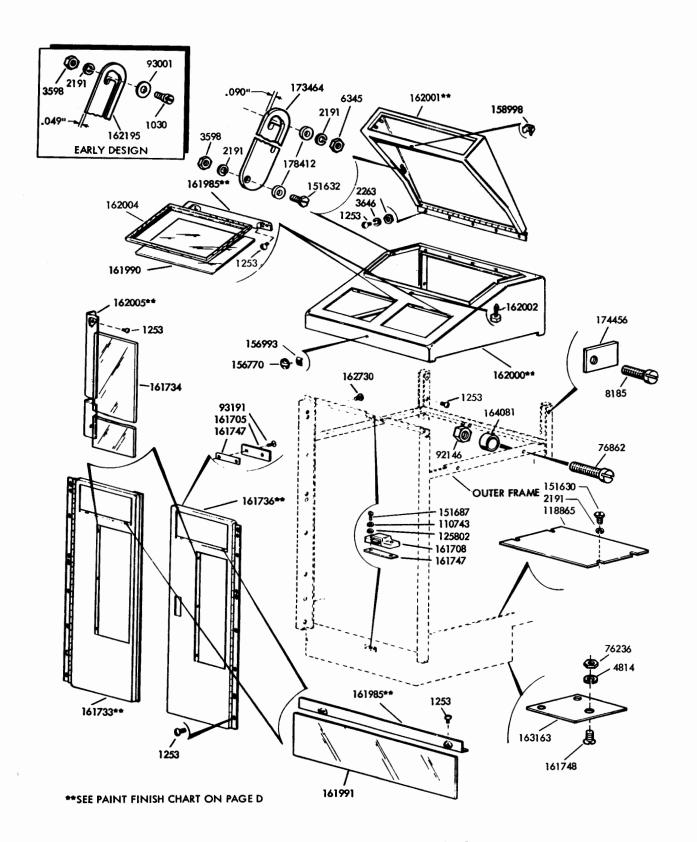


FIGURE 4-1. FRONT DOORS AND DOME

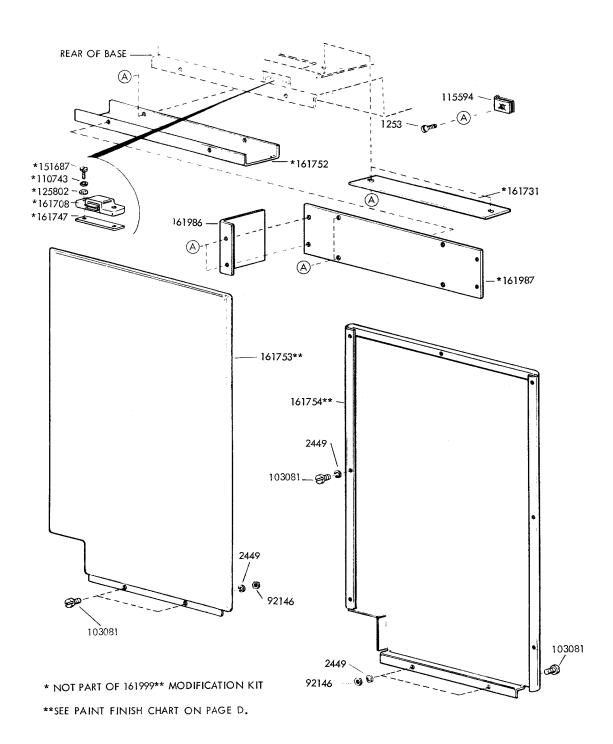


FIGURE 4-2. 161999** MODIFICATION KIT TO PROVIDE END ENCLOSURES

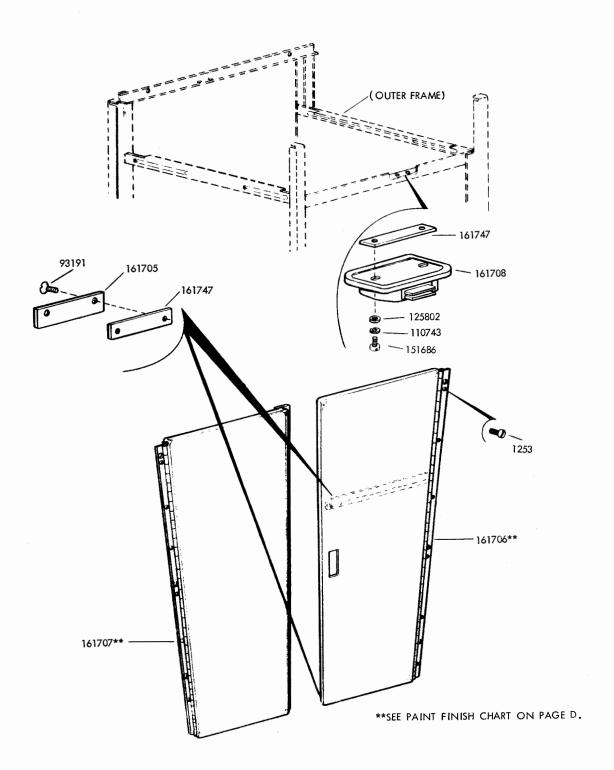


FIGURE 4-3. REAR DOORS AND LATCH MECHANISM

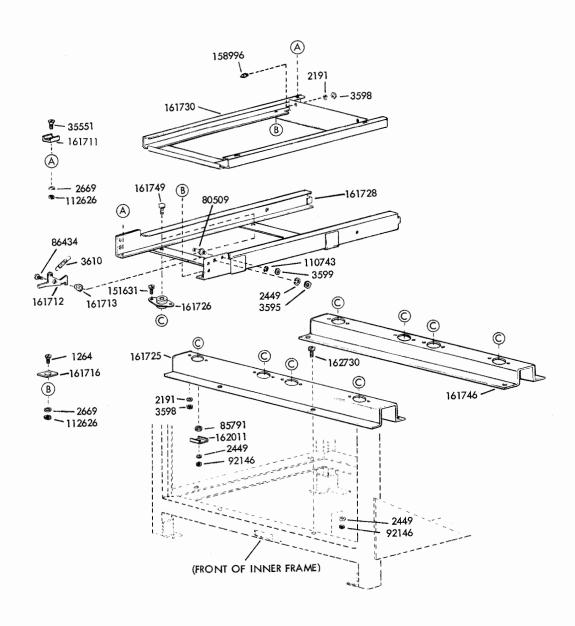


FIGURE 4-4. CHANNEL ASSEMBLIES

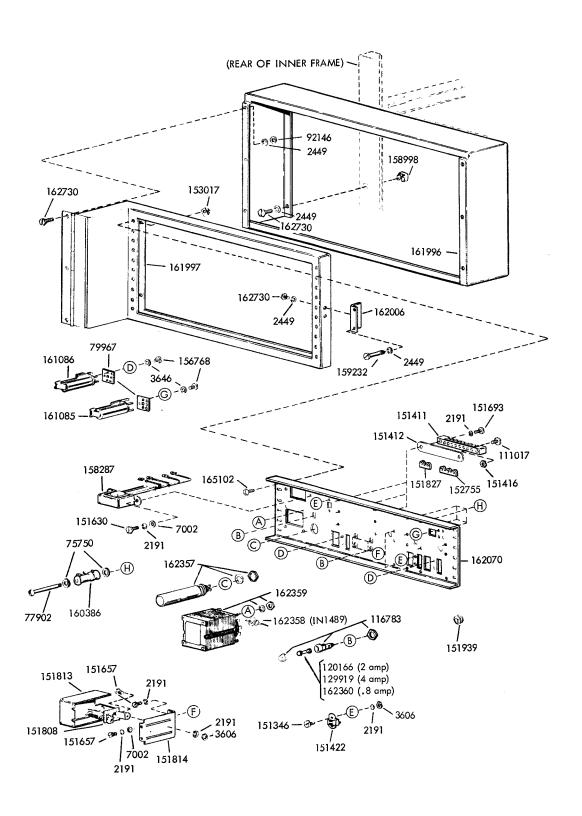


FIGURE 4-5. ELECTRICAL COMPONENTS

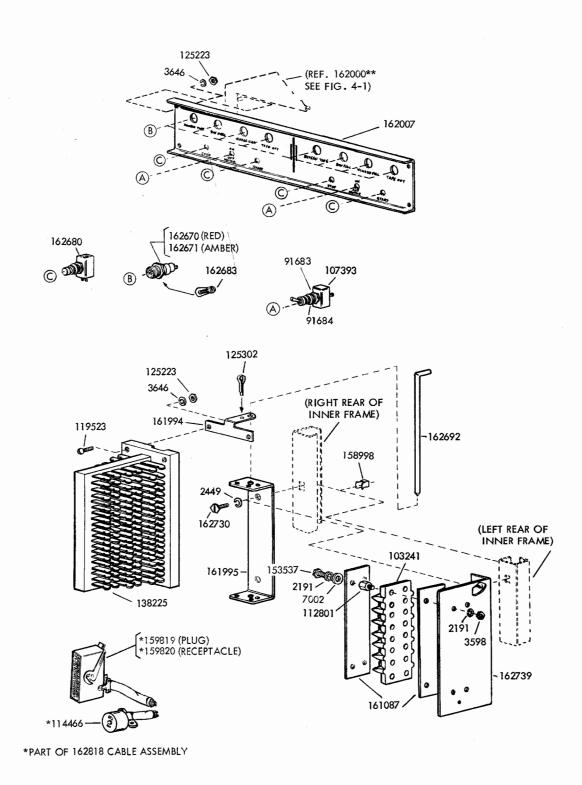
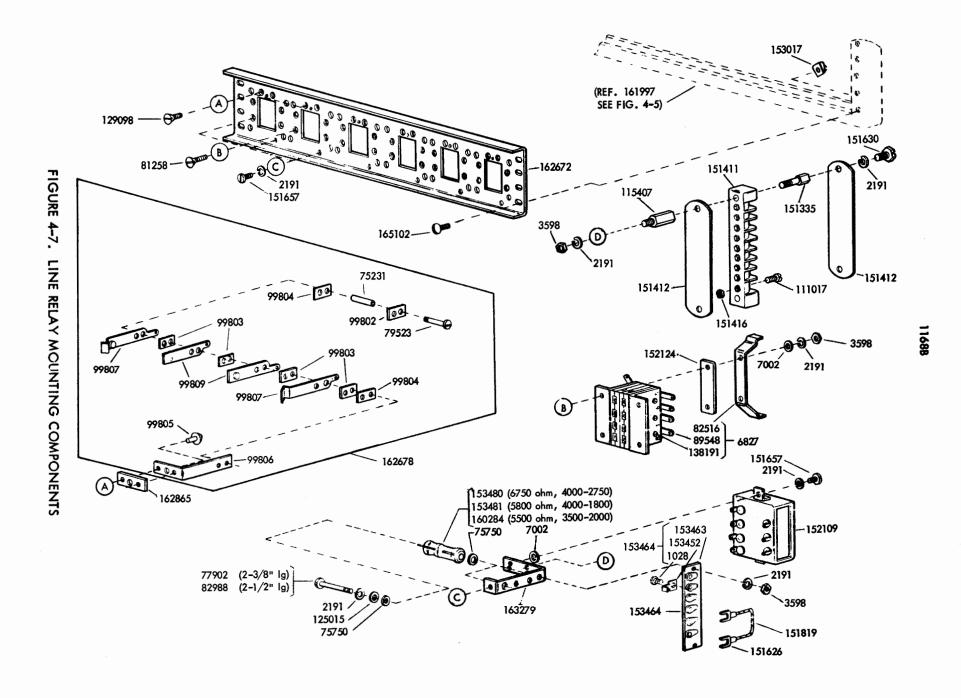


FIGURE 4-6. CONTROL PANEL AND TERMINAL BLOCKS



CHANGE 5

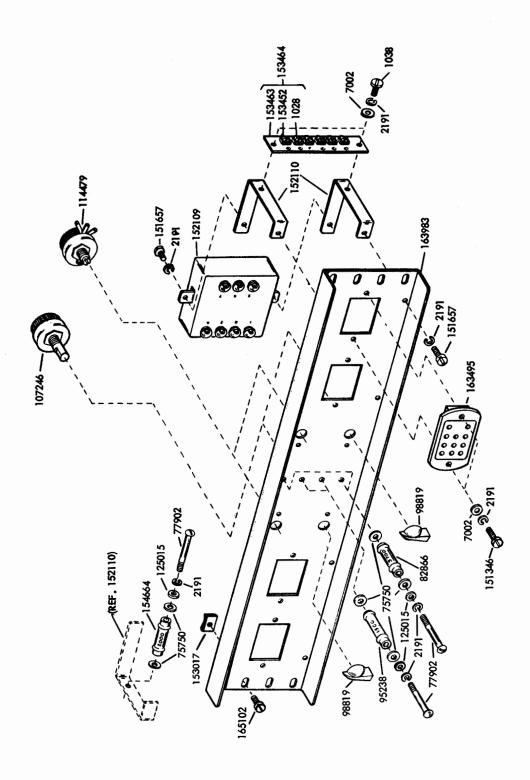
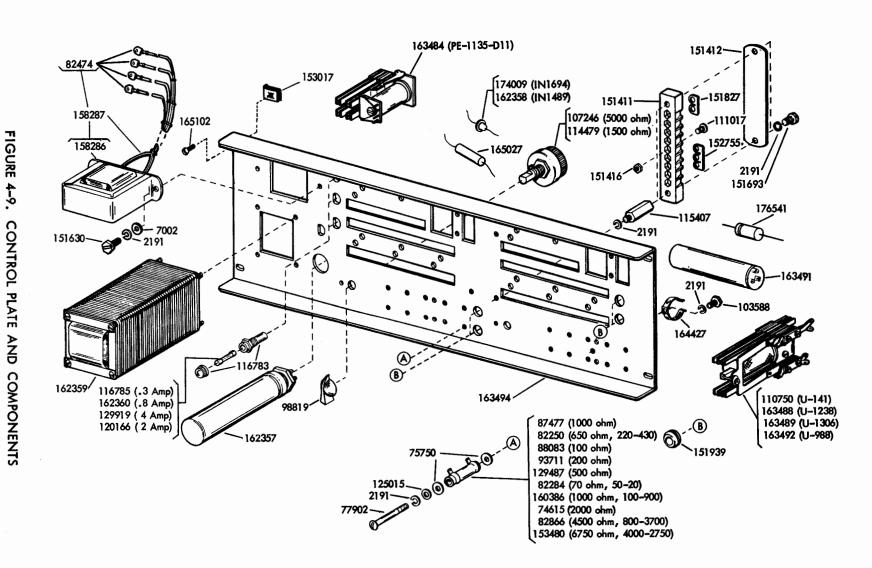


FIGURE 4-8. RELAY PLATE AND COMPONENTS



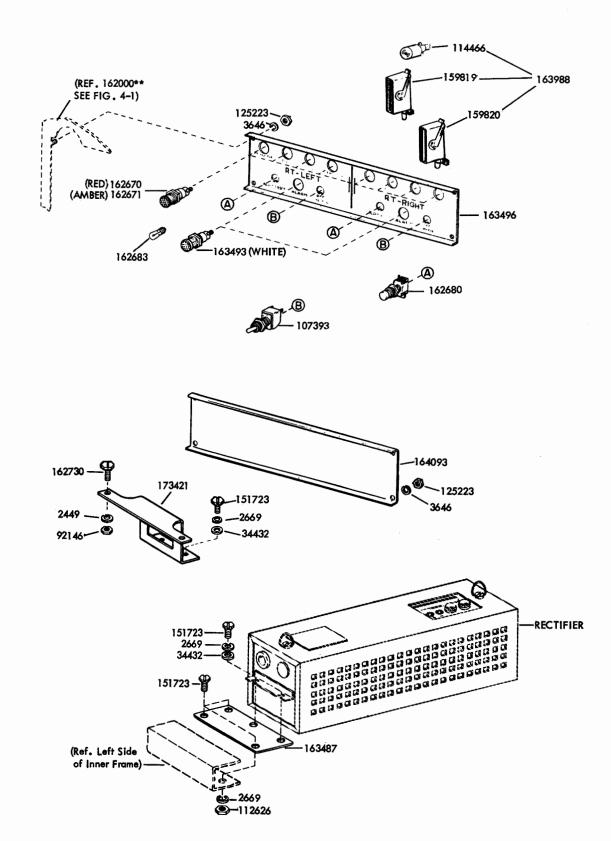


FIGURE 4-10. RECTIFIER MOUNTING PARTS AND CONTROL PLATE COMPONENTS

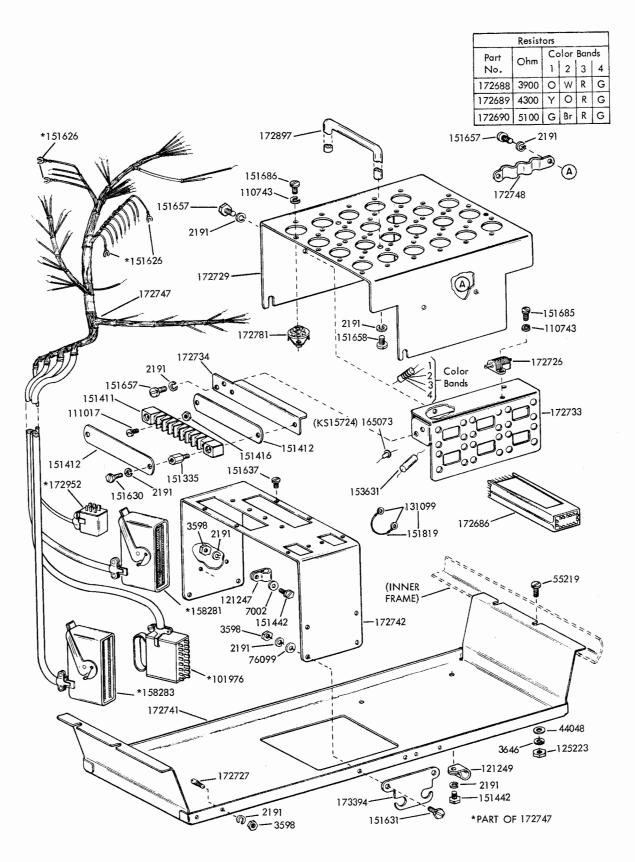


FIGURE 4-11. RELAY UNIT AND FRAME

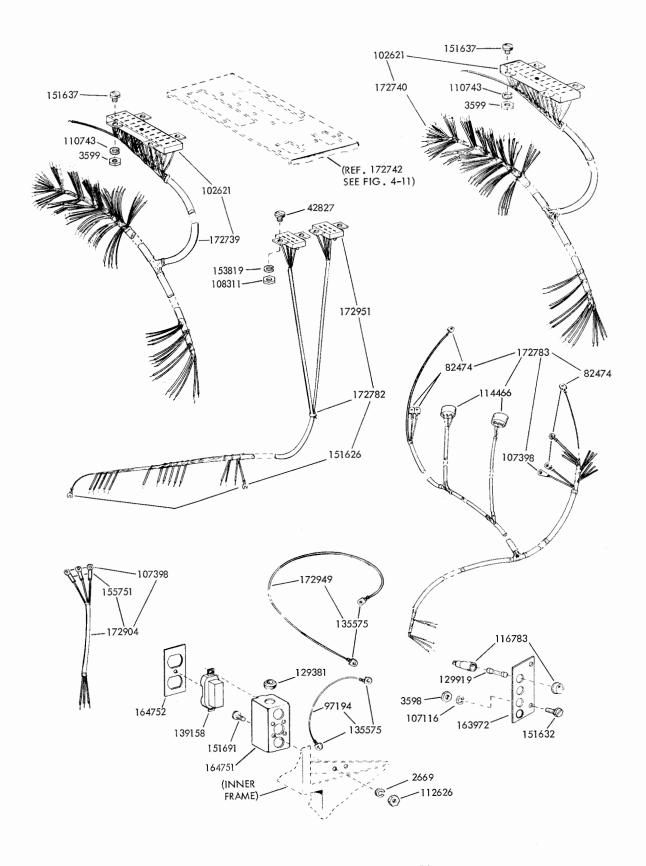


FIGURE 4-12. CABLE ASSEMBLIES

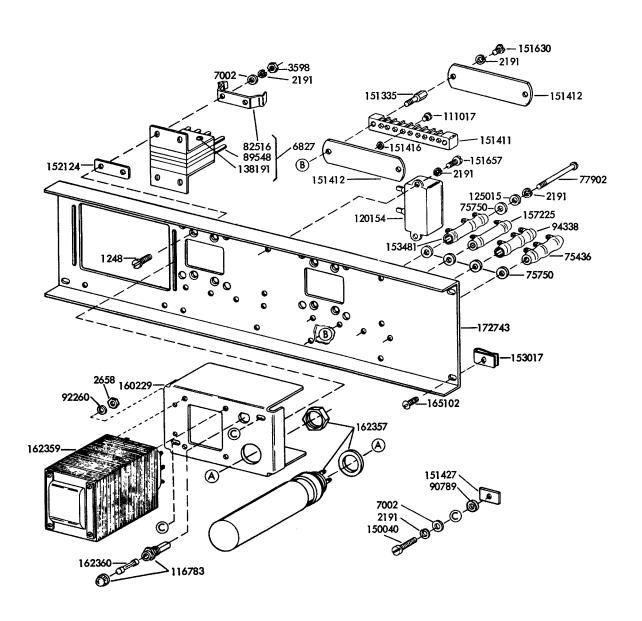
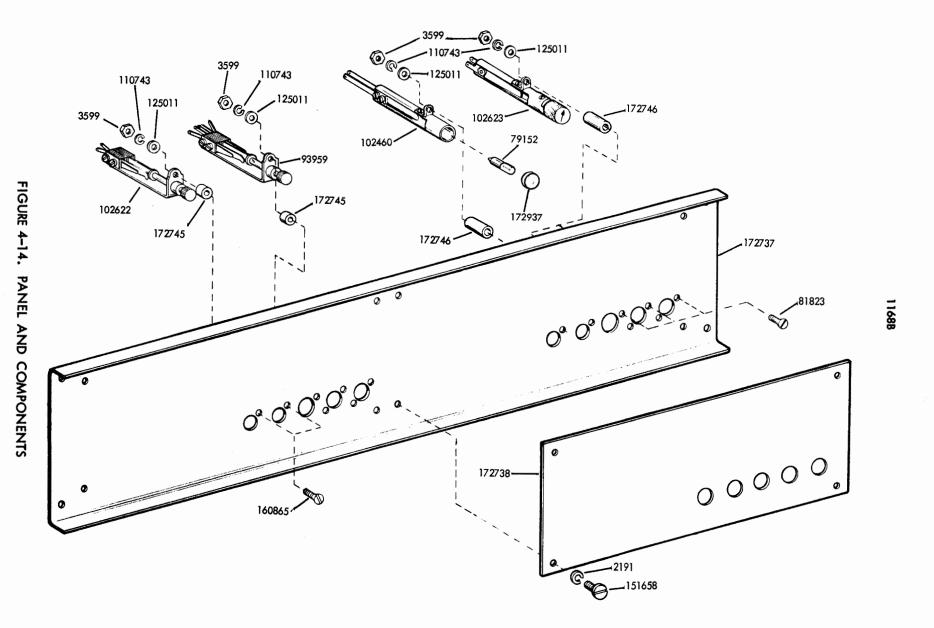
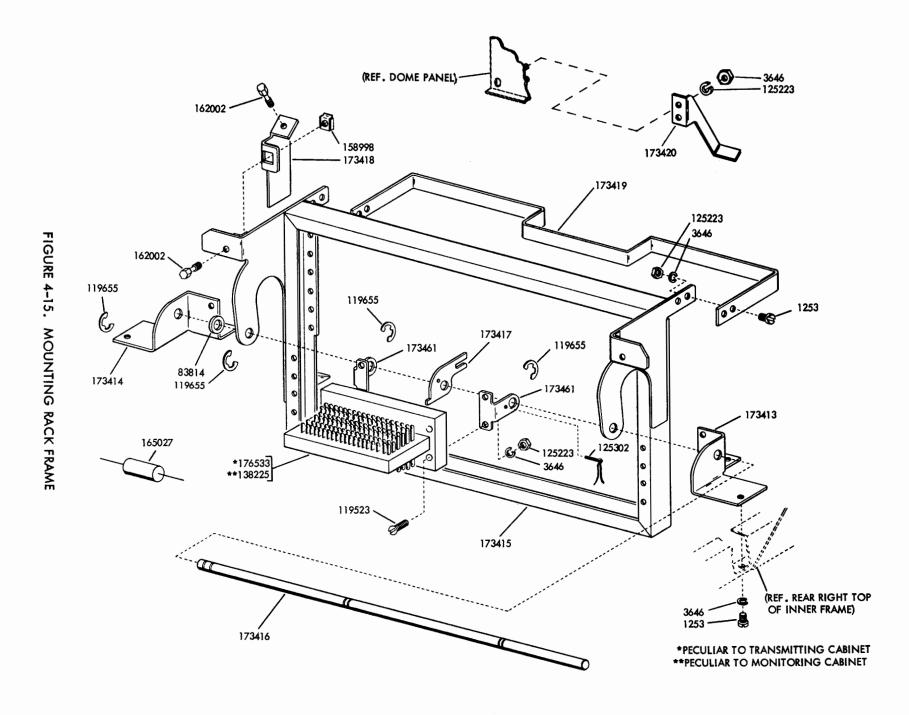


FIGURE 4-13. RELAY PLATE AND COMPONENTS





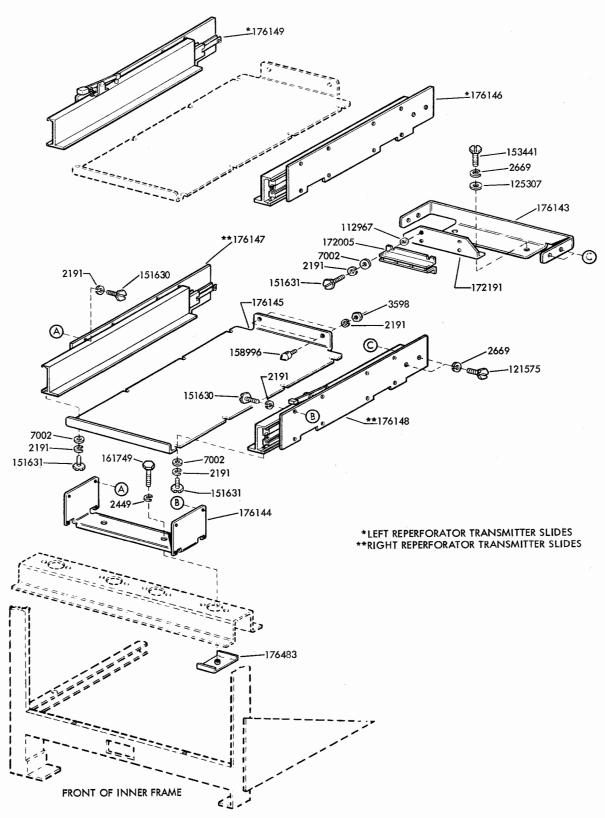


FIGURE 4-16. 176139 MODIFICATION KIT TO ADD BALL BEARING SLIDES FOR REPERFORATOR TRANSMITTER SETS

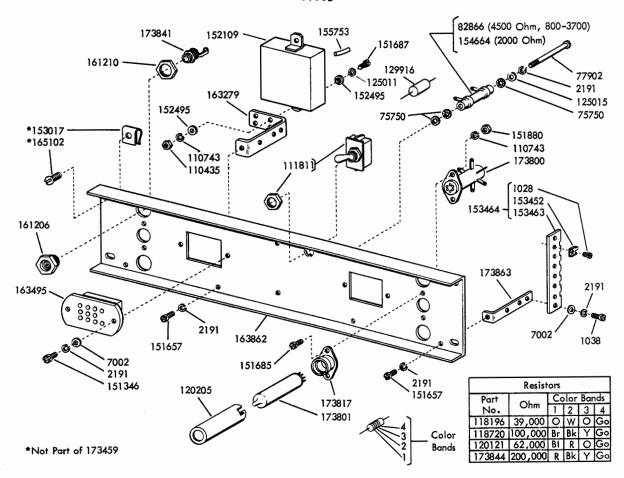


FIGURE 4-17. 173459 ELECTRONIC KEYER PLATE ASSEMBLY

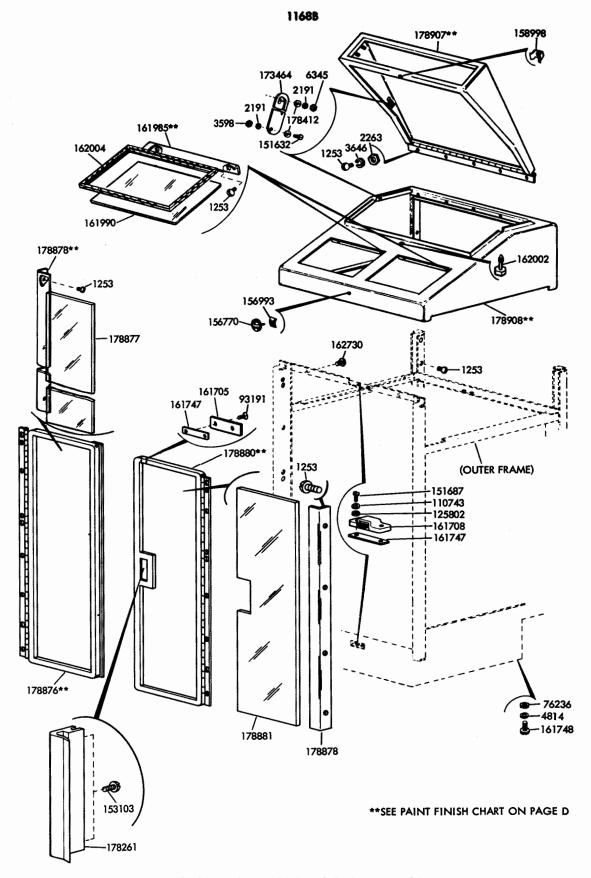


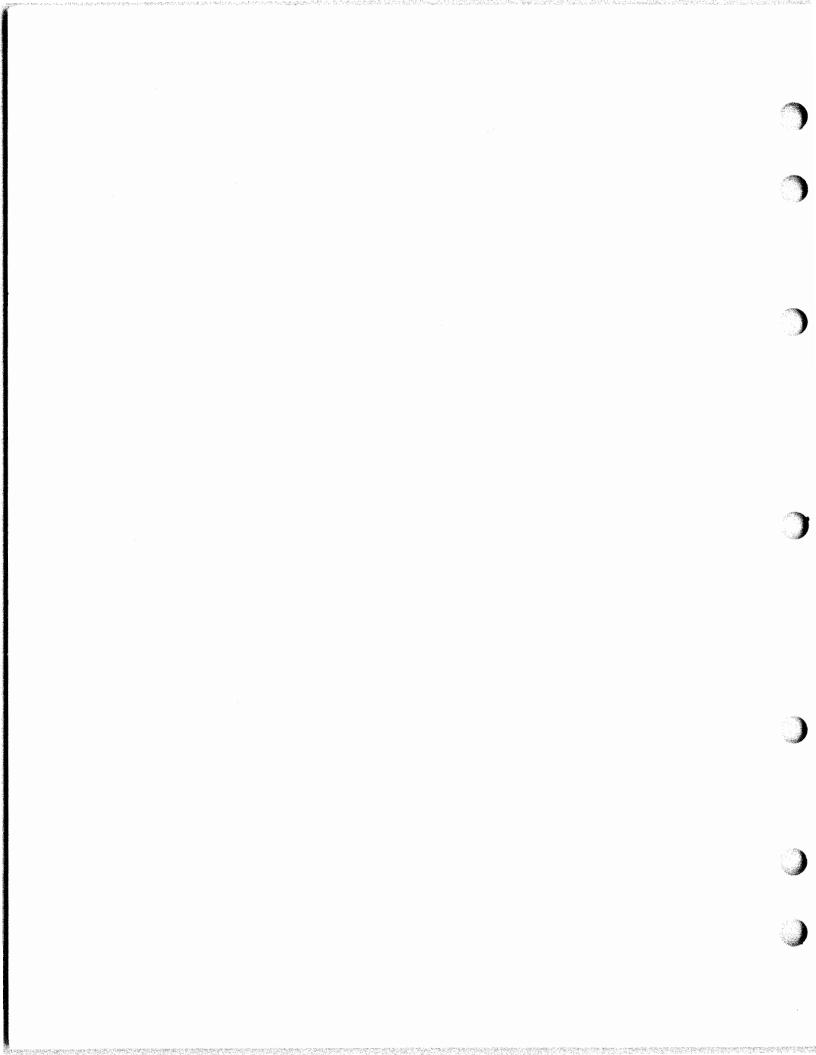
FIGURE 4-18. FRONT DOORS AND DOME

NUMERICAL INDEX - SECTION 4

Part	Description and	Part	Description and	Part	Description and
Number	Page Number	Number	Page Number	Number	Page Number
1028	Screw (4-40 × 1/4 Fil) 4-8,4-18	93001	Washer, Flat 4-2,4-19	125307	Washer, Flat 4-17
1030	Screw, Shoulder (6-40) 4-2,4-19	93191	Screw $(4-40 \times 5/16 \text{ Flat}) 4-2,4-4,$	125802	Washer, Flat 4-2,4-3,4-4,4-19
1038	Screw $(6-40 \times 9/32 \text{ Fil}) 4-9, 4-18$		4-19	129098	Screw (6-40 x 11/32 Flat) 4-8
1248	Screw (6-40 × 1/2 Flat) 4-14	93711	Resistor (200 ohms) 4-10	129381	Grommet , Rubber 4-13
1253	Screw $(8-32 \times 3/8 \text{ Rd}) 4-2,4-3,4-4,$	93959	Key 4-15	129487	Resistor (500 ohms) 4-10
	4-16	94338	Resistor (5000 ohms) 4-14	129916	Capacitor (.1 mfd) 4-18
1264	Screw (10-32 x 1/2 Flat) 4-5	95238	Resistor (1500 ohms) 4-9	129919 131099	Fuse (4 Amp) 4-6,4-10 Terminal 4-12
2191	Washer, Lock 4-2 to 4-10,4-12,	95971 97194	Screw (4-40 × 1/2 Flat) 4-15	135575	Terminal 4-13
00/0	4-14,4-15,4-17,4-18,4-19	98819	Jumper (8" Black) 4–13 Knob 4–9,4–10	138191	Screw (3-48 x 1 Rd) 4-8,4-14
2263 2449	Nut (8–32 Hex) 4–2 Washer, Lock 4–3,4–5,4–6,4–7,	99802	Plate 4-8	138225	Block, Terminal 4-7,4-16
2447	4-11,4-17	99803	Insulator (.094") 4-8	139158	Connector, Receptacle (Duplex) 4-13
2658	Nut (6-32 Hex) 4-14	99804	Insulator (.062") 4-8	150040	Screw (6-40 x 5/8 Fil) 4-14
2669	Washer, Lock 4-5, 4-11, 4-13, 4-17	99805	Plunger 4-8	151335	Stud 4-8,4-14
3595	Nut (1/4-32 Hex) 4-5	99806	Bracket 4–8	151346	Screw (6-40 x 3/8 Fil) 4-6,4-9,
3598	Nut (6-40 Hex) 4-2,4-5,4-7,4-8,	99807	Spring, Contact 4–8	151 /11	4-18 .
	4-12,4-13,4-14,4-17,4-19	99809	Spring, Contact 4-8	151411	Block, Terminal 4-6,4-8,4-10,
3599	Nut (4-40 Hex) 4-13,4-15	101976	Connector, Plug (33 Pt) 4-12	151412	4-12,4-14 Insulator (1-9) 4-6, 4-8, 4-10, 4-12,
3606	Nut (6-40 Hex) 4-6	102460 10262 1	Socket, Lamp 4–15 Connector, Receptacle (33 Pt) 4–13	131412	4-14
3610	Spring 4-5	102622	Key 4-15	151416	Nut (6-40 Hex) 4-6,4-8,4-10,
3646	Washer, Lock 4-2,4-6,4-7,4-11, 4-12,4-16,4-19	102623	Key 4-15		4-12,4-14,4-18
4814	Washer, Lock 4-2,4-19	103081	Screw (1/4-20 × 1/2 Fil) 4-3	151422	Connector, Receptacle (2 Pt) 4-6
6345	Nut (6-32 Hex) 4-2,4-19	103241	Block, Terminal 4-7	151427	Plate, Clamp 4–14
6827	Block 4-8, 4-14	103588	Screw (6-40 x 1/8 Hex) 4-10	151442	Screw (6-40 x 1/2 Hex) 4-12
7002	Washer, Flat 4-6 to 4-10,4-12,4-14,	107116	Washer, Lock 4–13	151626	Terminal 4-12,4-13
	4-17,4-18	107246	Rheostat (5000 ohms)4-9,4-10	151630	Screw (6-40 x 1/4 Hex) 4-2,4-6,
8185	Screw $(1/4-20 \times 3/4 \text{ Fil}) 4-2$	107393	Switch, Toggle (SP-ST) 4-7, 4-11	151401	4-8,4-10,4-12,4-14,4-17 Screw (6-40 x 5/16 Hex) 4-5,4-12,
34432	Washer, Flat 4–11	107398 108311	Terminal 4-13	151631	4-17
35551	Screw (10-32 x 3/8 Fil) 4-5	110435	Nut (3-48 Hex) 4-13 Nut (4-40 Hex) 4-18	151632	Screw (6-40 x 3/8 Hex) 4-2,4-13,
44048 55219	Washer, Flat 4–12 Screw (8–32 x 3/8 Fil) 4–12	110743	Washer, Lock 4-2 to 4-5,4-12,4-13,	101002	4-19
74615	*Resistor (2000 ohms) 4-10		4-15,4-18,4-19	151637	Screw (4-40 × 1/4 Fil) 4-12,4-13
75231	Bushing, Insulating 4-8	110750	Relay 4-10	151657	Screw (6-40 × 1/4 Fil) 4-6,4-8,4-9,
75436	Resistor (3000 ohms) 4-14	111017	Screw (6-40 x 5/16 Fil) 4-6,4-8,		4-12,4-14,4-18
75750	Washer, Insulating 4-6, 4-8, 4-9,		4-10,4-12,4-14	151658	Screw (6-40 x 5/16 Fil) 4-12,4-15
	4-10, 4-18	1118111	Switch, Toggle 4-18	151685	Screw (4-40 x 5/16 Fil) 4-12, 4-18
76099	Washer, Flat 4–12	112626	Nut (10-32 Hex) 4-5,4-11,4-13	151686 151687	Screw (4-40 x 3/8 Fil) 4-4,4-12 Screw (4-40 x 7/16 Hex) 4-2,4-3,
76236	Nut (5/16-18 Hex) 4-2,4-19	112801 112967	Stud 4–7 Washer, Flat 4–17	131007	4-4,4-18,4-19
76862	Screw (1/4-20 x 1 Rd) 4-2	114466	Connector, Receptacle (2 Pt) 4-7,	151691	Screw (10-32 x 3/8 Fil) 4-13
77902	Screw (6-40 x 2-3/8 Rd) 4-6,4-8, 4-9,4-10,4-14,4-18	114400	4-11,4-13	151693	Screw (6-40 x 9/16 Hex) 4-6,4-10,
79152	Lamp 4-15	114479	Rheostat (1500 ohms) 4-9,4-10		4-13
79523	Screw (2-56 x 25/32 Fil) 4-8	115407	Post 4-8,4-10	151723	Screw (10-32 x 3/8 Hex) 4-11
79967	Insulator 4–6	115594	Nut, Speed (8-32) 4-3	151808	Relay (1250 ohms) 4-6
80509	Post , Spring 4-5	116783	Holder, Fuse 4-6,4-10,4-13,4-14	151813	Cover 4-6
81823	Screw (4–40 x 1–3/32 Flat) 4–15	116785	Fuse (.3 amp) 4-10	151814 151819	Bracket 4–6 Jumper (3" Black) 4–2
82250	Resistor (650 ohms) 4-10	118196 118720	Resistor (39,000 ohms) 4-18 Resistor (100,000 ohms) 4-18	151827	Strap, Terminal 4-6,4-10
82284	Resistor (70 ohms) 4-10	118865	Cover 4-2	151880	Nut (4-40 Hex) 4-18
82474 82516	Terminal 4-13	119523	Screw (8-32 × 3/4 Rd) 4-7,4-16	151939	Grommet, Rubber 4-6,4-10
82866	Spring , Retaining 4–8 , 4–14 Resistor (4500 ohms) 4–9 ,4–10 ,4–18	119655	Ring, Retaining 4-16	152109	Filter 4-8,4-9,4-18
82988	Screw (6-40 × 2-1/2 Rd) 4-8	120121	Resistor (62,000 ohms) 4-18	152110	Bracket 4-9
83814	Washer, Flat 4–16	120154	Capacitor (25 mfd) 4–14	152124	Spacer 4-8,4-14
85791	Washer, Flat 4–5	120166	Fuse (2 Amp) 4-6,4-10	152495	Bushing 4-18
86434	Screw ($1/4-32 \times 3/4$ Fil) 4-5	120205	Shield, Tube 4-18	152755 153017	Strap, Terminal 4–6,4–10 Nut, Speed (12–24) 4–6,4–8,4–9,
87477	Resistor (1000 ohms) 4-10	121247	Clamp, Cable (7/16" ID) 4-12	133017	4-10,4-14,4-18
88083	Resistor (100 ohms) 4-10	121249 121575	Clamp, Cable (5/8" ID) Screw (10–32 x 5/16 Hex) 4–17	153103	Screw, Self-Tapping (4-40) 4-19
89548	Spring , Contact 4–8, 4–14	125011	Washer, Flat 4-15,4-18	153441	Screw (10-32 x 7/16 Hex) 4-17
90789 91683	Washer, Flat 4–14 Nut (15/32–32 Hex) 4–7,4–11	125015	Washer, Flat 4-8,4-9,4-10,4-14,	153452	Terminal 4-8,4-18
91684	Nut (15/32-32 Ring) 4-7,4-11		4-18	153463	Block, Terminal 4-8,4-18
92146	Nut (1/4-20 Hex) 4-2,4-3,4-5,	125223	Nut (8-32 Hex) 4-7,4-11,4-12,	153464	Block, Terminal 4-8,4-9,4-18
	4-6,4-11		4-16	153480	Resistor (6750 ohms) 4-8,4-10
92260	Washer, Lock 4–14	125302	Pin, Cotter 4–7,4–16	153481	Resistor (5800 ohms) 4-8,4-14

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Part	Description and	Part	Description and	Part Number	Page Number
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	- 44 40 0/0011 3 4 7	1 / 1 005	Bracket , Terminal Block 4-7	172734	Bracket 4-12
153537	50.00 (0 15 11 1)	161995 161996	Frame, Mounting 4-6	172737	Panel , Control 4-15
153631	t tormone / obain teleference	161997	Frame, Mounting Rack 4-6		Cover , Designation 4-15
153819	Tradition, Education	161999**	Modification Kit 4-3		Cable Assembly 4–13
154664	((03)3)01 (2000 0:)	162000**	Frame, Top 4-2	172740	Cable Assembly 4-13
155751	Sleeve, Insulating (1/8 ID x 1." Lg)	162001**	Dome 4-2		Shelf 4-12
1.55750	4–13 Sleeve, Insulating (1/8 ID x 1/2" Lg)	162002	Screw, Captive (1/4-20) 4-2,4-16,	172742	Bracket, Shelf 4–12
155753	4-18	102002	4-19		Plate, Relay 4–14
156768	Screw (8-32 x 9/32 Hex) 4-6	162004	Gasket 4-2,4-19		Bushing (.406" Lg) 4-15
156770	Plate, Identification (Teletype)4-2,	162005**	Bracket, Clip 4-2		Bushing (.703" Lg) 4-15
130770	4-19	162006	Bracket 4-6	172747	Cable Assembly 4-12
156993	Nut, Speed 4-2	162007	Panel, Control 4–7		Clamp, Cable 4-12
157225	Resistor (2000 ohms) 4-14	162011	Channel, Stop 4–5		Socket 4-12
158281	Connector, Plug (32 Pt) 4-12	162070	Plate, Mounting 4–6		Cable Assembly 4-13
158283	Connector, Receptacle (32 Pt) 4-12	162195	Arm, Slide 4-2,4-19		Cable Assembly 4-13
158286	Transformer 4–10	162357	Capacitor (500 mfd) 4-6, 4-10, 4-14		Handle 4-12
158287	Transformer Assembly 4-6, 4-10	162358	Diode, Silicon 4-6,4-10,4-14	172904	Cable w/Terminals 4–13 Cap, Lamp (White) 4–14
158996	Stud 4-5,4-17	162359	Transformer 4-6, 4-10, 4-14		Jumper (70" Green) 4-13
158998	Retainer , Speed Nut 4-7	162360	Fuse (.8 Amp) 4-6,4-10	172949	Connector, Receptacle (6 Pt) 4-13
	4-16,4-19	162670	Light, Pilot (Red) 4-7,4-11	172951	Connector, Plug (6 Pt) 4-12
159232	Screw, Captive (1/4-20) 4-6	162671	Light, Pilot (Amber) 4-7,4-11	172952 173394	Hanger, Cable 4-12
159819	Connector, Plug (32 Pt) 4-7,4-11	162672	Plate, Relay 4-8	173394	Bracket, Right Mounting 4-16
159820	Connector, Receptacle (32 Pt) 4–7,	162678	Contact Assembly , Line Shunt 4-8	173414	Bracket, Left Mounting 4-16
	4-11	162680	Switch, Push 4-7,4-11	173415	Frame, Mounting Rack 4-16
160229	Plate, Mounting 4–14	162683	Lamp, Incandescent (Clear) 4-7, 4-11	173416	Shaft 4-17
160284	Resistor (5500 ohms) 4-8	162692	Pin, Hinge 4-7 Screw (1/4-20 x 7/16 Hex) 4-6,	173417	Plate, Locating 4–16
160386	Resistor (1000 ohms) 4-6	162730		173418	Bracket, Left Anchor 4-16
	4-10	140720	4-7,4-11 Bracket , Terminal Board 4-7	173419	Handle 4-16
160865	Screw (4-40 x 7/8 Flat) 4-15	162739	Cable Assembly 4-7	173420	Arm, Stop 4-16
161085	Relay 4-6	162818 162865	Spacer 4-8	173421	Bracket, Rectifier Mounting 4-11
161086	Relay 4-6	163163	Pad 4-2	173459	Plate Assembly 4-18
161087	Insulator (1-6) 4-7	163279	Bracket, Mounting 4-8,4-18	173461	Bracket, Terminal Block 4-16
161206	Bushing, Insulating 4-18	163484	Relay 4-10	173464	Arm 4-2,4-19
161210	Nut (11/16 x 32 Hex) 4-18 Strike, Fastener 4-2,4-4,4-19	163487	Plate, Rectifier 4-11	173800	Turret, Socket 4-18
161705		163488	Relay 4-10	173801	Tube, Vacuum 4–18
161706* 161707*		163489	Relay 4-10	173817	Base, Tube Shield 4–18
161707	Latch, Magnetic 4-2,4-3,4-4,4-19	163491	Capacitor (250 mfd) 4-10	173841	Jack 4-18
161711	Block, Guide 4-5	163492	Relay 4-10	173844	Resistor (200,000 ohms) 4-18
161712	Latch, Lever 4–5	163493	Light, Pilot (White) 4-11	173863	Bracket, Mounting 4-18
161713	Bushing, Shoulder 4-5	163494	Plate, Mounting 4–10	174009	Diode 4-10
161716	Block, Support 4-5	163495	Base, Mounting 4–9,4–18	174456	Plate, Nut 4-2
161725	Channel, Front 4–5	163496	Panel, Control 4-11	176139	Modification Kit 4-17
161726	Mount, Vibration 4-5	163972	Strip, Fuse Mounting 4-13	176143	Bracket 4-17
161728	Support, Channel 4–5	163983	Plate, Relay 4–9	1 <i>76</i> 144 1 <i>76</i> 145	Bracket 4–17 Tray 4–17
161730	Frame, Mounting 4–5	163988	Cable Assembly 4-11	176146	Slide, Right (Left RT Set) 4-17
161731	Plate, Cover 4–3	164093	Panel, Control 4-11	176147	Slide, Left (Right RT Set) 4-17
161733*	* Door, Left 4–2	164427	Clip, Capacitor 4-10	176148	Slide, Right (Right RT Set) 4-17
161734	Window 4-2	164751	Box, Junction 4-13	176149	Slide, Left (Left RT Set) 4-17
161736		164752	Plate, Cover 4-13	176483	Channel, Stop 4-17
161746	Channel, Rear 4-5	165027	Network, Spark Suppression 4-16	176533	Block, Terminal 4-16
161747	Plate, Nut 4-2,4-3,4-4,4-19	165073	Diode 4-12 Screw (12-24 × 3/8 Rd) 4-6,4-8,	176541	Capacitor (3 mfd) 4-10
161748	Screw (5/16-18 x 5/8 Flat) 4-2, 4-19	165102	4-9,4-10,4-14,4-18	178261	Handle, Door 4–19
161749	Screw $(1/4-20 \times 1-1/2 \text{ Hex}) 4-5$,	172005	Latch, Magnetic 4-17	178363	Post 4-8
1/1750	4-17	172003	Bracket, Latch 4–17	178412	Bushing 4-2,4-19
161752		172686	Relay 4-12	178876*	
161753		172688	Resistor (3900 ohms) 4-12	178877	Window 4-19
161754		172689		178878*	Bracket , Clip 4-19
161985		172690		178880*	Door, Right 4-19
161986		172726		178881	Window 4-19
161987 161990		172727	<u> </u>		* Cover 4-19
161991	and the second s	172729		178908*	* Frame, Top 4–19
161994		172733			



SECTION 5

NOTES OF EXPLANATION

CONVERSION AND MODIFICATION KITS

NOTES OF EXPLANATION

Note 1: The 164598** Bin Assembly is equipped with a bin full alarm switch. The 179181** Bin Assembly is equipped with a slot for viewing the tape capacity (Fig. 1-6) without removal of the tape handling stand from the cabinet. The 160673** Bin Assembly has neither of these features. These bins are approximately 24-3/8" long by 14" wide, equipped with clear laminated glass and are for use only with chadless tape. The 173718** Bin Assembly is equipped with bin full alarm switch, the Note 2: (Fig. 1-14)170800** Bin Assembly is not. These bins are approximately 24-3/8" long by 14" wide, equipped with clear laminated glass and a chad box for use with fully perforated tape. Note 3: The 174626** Bin Assembly has the bin full alarm switch centrally located in the frame base. The 190328** Bin Assembly has the switch located at (Fig. 1-21)the rear. These bins are approximately 36-3/4" long by 23-1/4" wide, equipped with ribbed plexiglass and a chad box for use with fully perforated tape. The 178234** Bin Assembly is approximately 24-3/8" long by 14" wide, Note 4: (Fig. 1-24)equipped with ribbed plexiglass and a chad box for use with fully perforated tape. The 172907 (1/8" thick) and 158739 (.050" thick) spacers are used in place Note 5: (Fig. 2-2)of a gear in this position. The 158738 (.032" thick) and 158739 (.050" thick) spacers are required Note 6: (Fig. 2-2)with Early Design gears. The New Style gear has a shoulder which replaces the spacer. Note 7: The New Design 178396 bracket replaces both Early Design 158746 (transmitting) and 158749 (receiving) brackets. Orders for the Early Design (Fig. 2-2)parts will be filled with the New Design 178396 bracket which is used in both the transmitting and receiving positions. The 172784 bracket is peculiar to the special square base used in the AC205** Cabinet application. See Figures 2-13 and 2-14 for associated parts.

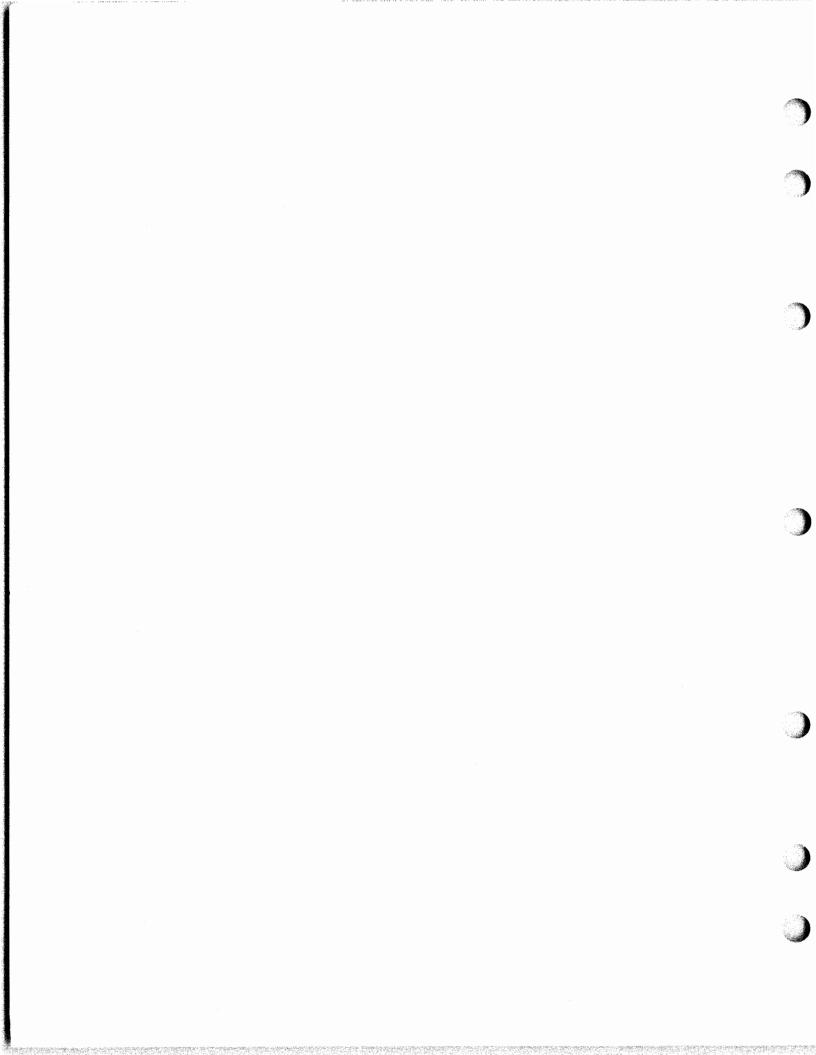
The 190596 Bin Assembly is approximately 36-1/2" long by 18-3/4" wide.

equipped with ribbed plexiglass and for use with fully perforated tape.

Note 8: (Fig. 1-27)

MODIFICATION KITS

Kit Number	Part Number	Description	Quanity	Page
173005	Special M	aintenance Parts Kit for LTHS200 and 201		
	76396	Washer, Felt	2	1-5
		Gear, Drive (144T)	ī	1-10
	98203 98223	Cam, Stop	i	1-5
	126912	Lever, Stop	i	1-6
	150990	Washer, Felt	i	1-6
		Washer, Felt	i	1-6
	153577	Bearing, Drive Shaft	i	1-6
	158980 158997	Belt, Drive	i	1-6
176176	Modificat	ion Kit to Provide Drive Parts for Low Speed Tape Handling Stand		
	17/177		1	1-19
	176177	Plate, Front	1	1-19
	170820	Plate, Mounting	1	1-19
	170817	Lever	1	1-19
	172291	Screw, Shoulder	1	1-19
	170824	Stud	-	1-19
	170825	Bearing		
	176178	Pulley]	1-19
	172293	Plate, Bearing - Outer	1	1-19
	171179	Belt	1	1-19
	174336	Reservoir	1	1-19
	174337	Holder, Wick		1-19
	174338	Wick	1	1-19
	179204	Bracket W/Stud		1-19
	179209	Gear		1-19
	179208	Pulley W/Gear	1	1-19
	179206	Bracket W/Stud		1-19
	172292	Plate, Bearing - Inner		1-17
	158964	Bracket		1 -3
	179395	Rod Assembly		1-19
	179211	Gear W/Disc (80T)		1-11
	2191	Washer, Lock		1-19
	7002	Washer, Flat	3	1-19
	112626	Nut (10-32 Hex)	3	1-19
	90504	Washer, Felt	1	1-19
	151721	Screw (6-40 x 3/4 Hex)		1-19
	151631	Screw (6-40 x 1/4 Hex)		1-19
	76461	Washer, Flat	2	1-17
	151630	Screw (6-40 x 1/4 Hex)		1-19
	151610	Washer, Flat		1-19
	153537	Screw (6-40 x 9/32 Hex)	2	1-19
	3606	Nut (6-40 Hex)	1	1-19
	101633	Washer, Flat	1	1-19
	119655	Ring, Retainer		1-19
	76474	Nut (10-32)	1	1-16
179746	Modificat	ion Kit to Provide a Molded Pulley and Gear for High Speed Tape Handling	Stand	
	179206	Bracket W/Stud	1	1-19
	179208	Pulley W/Gear		1-19
	179211	Gear		1-11
	101633	Washer, Flat		1-19
179175	Modificat	tion Kit to Provide Parts to Improve Tape Visibility in Bins of LTHS		
	179178**	Frame, Tape Storage	1	1-7
	179177	Channel, Mounting	i	1-7
	179176	Liner		1-7
			•	
179382		tion Kit to Provide a Gear Guard for Tape Handling Stands	1	1-13
	1/9381**	Guard, Gear	1	1-1



SECTION 6

NUMERICAL INDEX

MASTER NUMERICAL INDEX

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